# APPENDIX 8 COORIDOR EVALUATION AND HIGHWAY DATA

# CORRIDOR EVALUATION ARIZONA RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

#### GENERAL DESCRIPTION OF ARIZONA'S CORRIDORS

#### **Corridors**

Arizona has identified one corridor for the study and it is called CANAMEX.

# **Highways**

The CANAMEX corridor is composed of two highways: Interstate 19 [I-19] and State Road 189 [SR 189]. Both highways run North-South. No data are available for SR189 and only AADT and segment length are available for I-19. No data on Level of Service [LOS] or capacity is provided. Therefore, the level of current or future congestion on Arizona highways cannot be established.

# **Land Ports of Entry [POE]**

There are seven land POEs in Arizona: San Luis, Lukeville, Sasabe, Naco, Nogales-DeConcini, Nogales-Mariposa, and Douglas. Nogales-Mariposa and Nogales DeConcini are directly connected to SR 189. In calendar year 2000, about 345,000 trucks carrying 42.9 million tons of goods were transported through north across the US-Mexico border at Land POE in Arizona. Also in calendar year 2000, about 10.3 million passenger vehicles crossed the US-Mexico border north into Arizona through the seven land POEs.

# **Airports**

There are seven airports in Arizona that are within 100 km of the US-Mexico border. Four of the airports are designated as international ports of entry and are included in this evaluation. Those airports are: Bisbee-Douglas International Airport, Douglas Municipal Airport, Nogales International

Airport and Tucson International Airport. Of the four airports used in this evaluation, Tucson has the longest runway length at 10,994 feet. The four airports in this study transported about 35,000 tons of goods in calendar year 2000.

# Railroads

There is one railroad that operates in the CANAMEX corridor and it is the Union Pacific. The Union Pacific rail lines cross the US-Mexico border at the Nogales-DeConcini POE. UP transported about 332,400 tons and 8,700 twenty foot equivalent containers across the US-Mexico border north into Arizona in calendar year 2000.

## **Maritime Ports**

Arizona has no maritime ports and no plans to construct a maritime port between now and 2020.

**Source**: Arizona BINS Technical Committee representative.

#### ANALYSIS OF CORRIDOR EVALUATION RESULTS

There is only one corridor identified in Arizona and it is called CANAMEX. Because there is only one corridor, there are no corridor comparisons.

#### **Historical Data**

This discussion reviews highway, land POE, airport, maritime port and rail data and results. With regard to the highways, the CANAMEX corridor averaged about 24,000 vehicles per day over its 63 miles in 2000. Arizona did not provide level of service or capacity data therefore it is not possible to ascertain the level of congestion.

The 345,000 trucks that crossed the US-Mexico border passing through the seven land POEs in Arizona during calendar year 2000, transported more than 99% of the volume of all goods moved by land across the US-Mexico border at the seven land POEs during calendar year 2000. The port of Nogales-Mariposa had the most truck crossings with about 254,700 trucks, or about 74% of the state total. Of the 10.3 million passenger vehicles that crossed the US-Mexico border north into Arizona in calendar year 2000, about 29% passed through the Nogales-DeConcini port of entry.

For the approximately 3,400 rail cars that crossed the US-Mexico border at Nogales-DeConcini in calendar year 2000, the average ton move per rail car is about 98 tons.

# **Change Data**

This discussion will review highway, land POE, airport and rail data for both absolute changes and percent changes. With regard to absolute changes in highway data, average annual daily traffic [AADT] on the CANAMEX corridor increases 6,023 between calendar year 2000 and 2020 while the highway length of I-19 remains constant.

Truck crossings at land POE are projected to increase by about 382,200 between 2000 and 2020 while passenger vehicles crossing at the land POE are projected to increase by about 5.3 million vehicles between 2000 and 2020. For railroads, the total tonnage is projected to increase by about 223,000 while TEUs are projected to increase by about 5,870 - both between 2000 and 2020. For airports, the total volume of tons transported at the airports is projected to increase by about 31,000 tons between 2000 and 2020.

With regard to percent changes in highway data, AADT is projected to grow about 25% between 2000 and 2020. The number of trucks crossing the land POE is projected to increase by about 211% between 2000 and 2020 while the number of passenger vehicles crossing the US-Mexico border north into Arizona is projected to increase by about 52%. With respect to railroads, the number of rail cars crossing the US-Mexico border into Arizona is projected to increase about 167% between calendar year 2000 and 2020. With respect to airport tonnage, it is projected to increase about 89% between 2000 and 2020.

Table 1 **Summary Corridor Results** 

	Corri	dor Score	s <sup>1</sup>	Evalu	ation Res	ults
CANAMEX	Α	В	С	Α	В	С
Historical Data for 2000 <sup>2</sup>						
Highways	4			1		
Land Ports of Entry	8			1		
Airports	2			1		
Maritime Ports <sup>3</sup>						
Railroads	8			1		
Sum of Historical Scores:	22			1		
Changes Between 2000 and 20204						
Highways	4			1		
Land Ports of Entry	8			1		
Airports	2			1		
Maritime Ports <sup>3</sup>						
Railroads	8			1		
Sum of Change Scores:	22			1		
Overall Scores <sup>5</sup> :	44					
Overall Result:	1					

- The Corridor Scores are from the results in Tables 2, 4 and 5.
- Historical results from Table 2. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- Arizona has no maritime ports.

  The Changes Scores is the sum of the corridor results from the Corridor Changes [Table 4] and the corridor results from the Corridor Percent Changes [Table 5].
- The Overall Score is the sum of the Historical Score and the Changes Score. The Historical Data scores and the Changes Between 2000 and 2020 scores are equally weighted.

Table 2
Corridor Data and Results For 2000

	C	Corridor Raw Data	1		ion :s	
CANAMEX	Α	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	24,026			1		
Highway Length [in miles]	63.090			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		Highway Scores	·	2		
		Overall Highway	y Result	1		
Land Port of Entry Border Crossing						
Number trucks	344,945			1		
Total volume [tons]	42,925,707			1		
Value of goods Millions \$	\$8,308			1		
# passenger vehicles & buses	10,321,419			1		
		POE Scores		4		
		Overall POE Res	ult	1		
Airports						
Total volume [tons]	34,835			1		
		Airport Scores	•	1		
		Overall Airport	Result	1		
Maritime Ports - NONE						
Total volume [tons]						
Total number TEUs						
		Maritime Port S	core			
		Overall Maritim	e Result			
Railroads Border Crossing at POE						
Number rail cars	3,392			1		
Total volume [tons]	332,417			1		
Total Number TEUs	8,748			1		
Value of goods Millions \$	\$1,856			1		
		Railroad Scores		4		
		Overall Railroad	Result	1		
Total AADT in One Corridor	Share o	f AADT Among Co	orridors			
24,026	100.0%	0.0%	0.0%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution. Historical data from Arizona BINS Technical Committee Representative, see Tables 6 - 9 for details.

Table 3
Corridor Data and Results For 2020

	Co	orridor Raw Data			ion ts	
CANAMEX	Α	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	30,049			1		
Highway Length [in miles]	63.090			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		Highway Scores		2		
		Overall Highway	Result	1		
Land Port of Entry Border Crossing						
Number trucks	727,144			1		
Total volume [tons]	90,487,390			1		
Value of goods Millions \$	\$29,826			1		
# passenger vehicles & buses	15,659,112			1		
•		POE Scores		4		
		Overall POE Resu	ılt	1		
Airports						
Total volume [tons]	65,850			1		
		Airport Scores		1		
		Overall Airport F	Result	1		
Maritime Ports - NONE						
Total volume [tons]						
Total number TEUs						
		Maritime Port So	core			
		Overall Maritime Result	•			
Railroads Border Crossing at POE						
Number rail cars	5,668			1		
Total volume [tons]	555,469			1		
Total Number TEUs	14,618			1		
Value of goods Millions \$	\$5,314			1		
		Railroad Scores		4		
		Overall Railroad	Result	1		
Total AADT in One Corridor	Share of	AADT Among Cor	ridors			
30,049	100.0%	0.0%	0.0%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Forecasts for highway and airport are from Arizona BINS Technical Committee representative. See Tables 6 and 8 for details Other forecasts are derived from secondary sources. See Tables 7 for details.

Table 4 Corridor Changes and Results, 2000 - 2020

	Co		ion is			
CANAMEX	Α	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	6,023			1		
Highway Length [in miles]	0.000			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		Highway Score	es	2		
		Overall Highw		1		
Land Port of Entry Border Crossing			Ĭ			
Number trucks	382,199			1		
Total volume [tons]	47,561,683			1		
Value of goods Millions \$	\$21,518			1		
# passenger vehicles & buses	5,337,693			1		
1 3		POE Scores	I	4		
		Overall POE Re	esult	1		
Airports						
Total volume [tons]	31,015			1		
		Airport Scores	<del></del>	1		
		Overall Airpor		1		
Maritime Ports - NONE		•				
Total volume [tons]						
Total number TEUs						
		Maritime Port	Score			
		Overall Mariti	me Result			
Railroads Border Crossing at POE						
Number rail cars	2,276			1		
Total volume [tons]	223,052			1		
Total Number TEUs	5,870			1		
Value of goods Millions \$	\$3,458			1		
		Railroad Score	es	4		
		Overall Railro	ad Result	1		
Total AADT in One Corridor	Share of	AADT Among Co	orridors			
6,023	100.0%	0.0%	0.0%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution. Differences are estimated by subtracting the year 2000 data from the 2020 projections.

See Tables 6 - 9 for details.

Table 5
Corridor Percent Changes and Results, 2000 - 2020

	C	orridor Raw Data		Evaluation Results		
CANAMEX	Α	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	25.1%			1		
Highway Length [in miles]	0.0%			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		Highway Scores		2		
		Overall Highway Resu	ult	1		
Land Port of Entry Border						
Crossing						
Number trucks	210.8%			1		
Total volume [tons]	210.8%			1		
Value of goods Millions \$	359.0%			1		
# passenger vehicles & buses	51.7%			1		
		POE Scores		4		
		Overall POE Result		1		
Airports						
Total volume [tons]	89.0%			1		
		Airport Scores		1		
		Overall Airport Resul	t	1		
Maritime Ports - NONE						
Total volume [tons]						
Total number TEUs						
		Maritime Port Score				
		Overall Maritime Res	ult			
Railroads Border Crossing at POE						
Number rail cars	167.1%			1		
Total volume [tons]	167.1%			1		
Total Number TEUs	167.1%			1		
Value of goods Millions \$	286.3%			1		
		Railroad Scores		4		
		Overall Railroad Resu	ılt	1		

See Tables 6 – 9 for details.

Table 6
Highway Data for the CANAMEX Corridor [Corridor A]

Highway	Year	Year	Change	, 2000 to 2020
Factors	2000	2020	Data	Per Cent
AADT	24,026	30,049	6,023	25.1%
Highway Length	63.090	63.090	0.000	0.0%
LOS [A to F]				
LOS#				
Capacity				

All data are from Interstate 19

LOS is the Level of Service

AADT is Average Annual Daily Traffic

Highway length is in miles

**Source:** Arizona BINS Technical Committee representative

Table 7
Land Ports of Entry [POE] Crossing Data

	San Luis	Lukeville	Sasabe	Nogales-De	Nogales-Ma	Naco	Douglas	Total
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	
Northbound POE Crossing Data for 20	00 <sup>1</sup>							
Number trucks	40,348	3,840	2,652	0	254,694	9,817	33,594	344,945
Tons of goods	326,577	3,673		0	42,303,974	79,109	212,374	42,925,707
Value [Millions \$] moved by truck	\$816.8	\$2.9		\$0.0	\$6,654.7	\$186.9	\$646.9	\$8,308.2
Number of passenger vehicles	2,597,835	400,493	32,823	2,998,046	1,686,401	339,196	2,252,216	10,307,010
Number of buses	38	404	0	0	8,899	0	5,068	14,409
Number passenger vehicles & buses	2,597,873	400,897	32,823	2,998,046	1,695,300	339,196	2,257,284	10,321,419
Number of rail cars	0	0	0	3,392	0	0	0	Х
Volume of tons moved by rail	0	0	0	332,417	0	0	0	Х
Number of TEUs moved by rail	0	0	0	8,748	0	0	0	Х
Value [Millions \$] moved by rail	\$0	\$0	\$0	\$1,856.1	\$0	\$0	\$0	Х
Northbound POE Crossing Data for 20	20 <sup>2</sup>							
Number trucks								727,144
Tons of goods								90,487,390
Value [Millions \$] moved by truck								\$29,826.4
Number of passenger vehicles								Х
Number of buses								Х
umber passenger vehicles & buses								15,659,112
Number of rail cars				5,668				Х
Volume of tons moved by rail				555,469				Х
Number of TEUs moved by rail				14,618				Х
Value [Millions \$] moved by rail				\$5,314.0				Х
Per Cent Change in POE Data: 2000 to	2020							
Number trucks <sup>3</sup>								210.8%
Tons of goods <sup>3</sup>								210.8%
Value [Millions \$] moved by truck <sup>3</sup>								359.0%
Number of passenger vehicles								Х
Number of buses								Х

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	San Luis	Lukeville	Sasabe	Nogales-De	Nogales-Ma	Naco	Douglas	Total
Numb. passenger vehicles & buses <sup>4</sup>								51.7%
Number of rail cars <sup>5</sup>				167.1%				Χ
Volume of tons moved by rail <sup>5</sup>				167.1%				Х
Number of TEUs moved by rail <sup>5</sup>				167.1%				Х
Value [Millions \$] moved by rail⁵				286.3%				Х

Number of trucks = northbound trucks that cross the US-Mexico border

Tons of goods = carried by northbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by northbound trucks that cross the US-Mexico border.

Number of passenger vehicles = northbound passenger vehicles that cross the US-Mexico border.

Number of buses = northbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of northbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = northbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by the northbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are northbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by northbound rail cars that cross the US-Mexico border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

The Port of Sasabe gets a small number of commercial shipments that are not captured in the automated system.

#### Sources:

- From Arizona BINS Technical Committee representative.
- Derived my multiplying the 2000 data by the growth rates.
- The growth rates for trucks, tons and dollars are derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, "Freight Transportation Profile Arizona". There are absolute values forecast for the year 2020 for tons and dollars with 1998 data as the base year. Growth rates are calculated for the 22 year period, and 20 year growth rates are estimated. These 20-year growth rates are the ones used in this table. For tons and trucks the compound annual growth rate is 3.8%. For the value of goods moved by truck, the compound annual growth rate is 7.7%.
- The growth rate for passenger vehicles and buses is the same as that observed for the change in Average Annual Daily Traffic [AADT] in the highway segments nearest the US-Mexico border. These AADT data were obtained from the I-19 data provided by the Arizona BINS Technical representative

I-19 Segment 1 AADT in 2000: 10,614 Change between 2000 & 2020 in Segment 1: 5,489
I-19 Segment 1 AADT in 2020: 16.103 Percent increase in AADT in Segment 1: 51.7%

The 51.7% is used to forecast the number of border crossings for passenger vehicles and buses in 2020.

The growth rates for rail cars, tons, TEUs & dollars are derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, "Freight Transportation Profile - Arizona". There are abso lute values forecast for the year 2020 for tons and dollars with 1998 data as the base year. Growth rates are calculated for the 22 year period, and 20 year growth rates are estimated. These 20-year growth rates are the ones used in this table. For rail cars, tons of goods moved, and TEUs moved, the compound annual growth rate is 2.6%. For the value of goods moved by rail the compound annual growth rate is 5.4%.

Table 8
Airport Data

	Bisbee- Douglas Intl	Cochise College	Douglas Municipal	Libby	Nogales International	Tucson	Yuma	Total
Within 100 km of the US-Mexico Border?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	
Designated as an International POE?	Yes	No	Yes	No	Yes	Yes	No	
Historical Data for 2000								
Longest runway length	7,290		5,760		7,199	10,994		10,994
Tons of goods exported & imported	unknown		unknown		435	34,400		34,835
Airport served by railroad facility?	No		No		No	Yes		Х
If yes, name of railroad						Union Pacific		Х
On-land movement of air freight	Х	Х	Х	Х	Х	Х	Х	Х
Share of goods moved by truck	unknown		unknown		100.0%	unknown		Х
Share of goods moved by railroad	unknown		unknown		0.0%	unknown		Х
Projections for 2020								
Longest runway length	8,700		5,760		7,199	11,000		11,000
Date becomes operational			unknown					Х
Tons of goods exported & imported	unknown		unknown		950	64,900		65,850
Airport served by railroad facility?			N/A		No	Yes		Х
If yes, name of railroad						Union Pacific		X
On-land movement of air freight	Х	Х	Х	Х	Х	Х	Х	Х
Share of goods moved by truck	unknown		unknown		100.0%	unknown		
Share of goods moved by railroad	unknown		unknown		0.0%	unknown		
Per Cent Change: 2000 to 2020								
Longest runway length								0.1%
Tons of goods exported & imported								89.0%

Only data for facilities that meet minimum criteria are included.

**Source:** Arizona BINS Technical Committee representative.

# Table 9 Maritime Port Data

There are **NO MARITIME PORTS** in Arizona

# CORRIDOR EVALUATION BAJA CALIFORNIA RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

#### GENERAL DESCRIPTION OF BAJA CALIFORNIA'S CORRIDORS

#### Corridors

Baja has identified 12 corridors for the evaluation and each corridor represents a highway segment and is identified by a letter. The corridor names, an identification letters [A to L], and the highway numbers are contained in Table 5 [page 14]. Most tables contain the highway name and identification letter Corridor K [Central Camionera Garita] does not have trucks move along its roadway.

# **Highways**

The highways that are specified in this evaluation are highways MX-1D, MX-1, MX-2D, MX-2, MX-3, MX-5, BCN-2 and two local roads [Via Rapida Oriente & Boulevard Bella Artes].

# **Land Ports of Entry [POE]**

There are six land POEs in Baja: Puerta Mexico, Mesa de Otay, Tecate, Mexicali, Mexicali-Este, and Algodones. In calendar year 2000, about 925,000 trucks crossed the border traveling south into Baja through four land POEs. Also in calendar year 2000, about 22.3 million passenger vehicles crossed the border into Baja through the six land POEs.

# **Airports**

There are three airports located within 100 km of the US-Mexico border, but only the Mexicali and Tijuana airports are included in this evaluation because they are the only two airports designated as international ports of entry. The longest runway at both airports is 2,600 meters. During calendar year 2000, airplanes arriving and departing at the Mexicali and Tijuana airports transported about 76,000 tons of goods

#### Railroads

There are two railroads that operate within 100 km of the U.S.-Mexico border: the Ferrocarnil [FFRR] Via Corta Tijuana-Tecate, and the Ferrocarnil Sonora-Baja California [FFRR-FSBC]. The FFRR Via Corta Tijuana-Tecate operates in the Tijuana-Tecate corridor [Corridor G]. The FFRR-FSBC operates in the Mexicali-Eljido Puebla corridor [Corridor E]. The rail lines of the FFRR-FSBC cross the US-Mexico border at the Mexicali POE. In 2000 there were 335,000 tons of goods transported south across the US-Mexico border into Baja at the Mexicali POE by the FFRR-FSBC railroad. The rail lines of the FFRR Via Corta Tijuana-Tecate cross the US-Mexico border at Puerta Mexico. In 2000 there were about 2,400 rail cars that crossed the US-Mexico border at Puerta Mexico POE heading south into Baja.

# **Maritime Ports**

Baja has one maritime port located within 100 km of the U.S.-Mexico border and designated as an international port of entry. That port is the Port of Ensenada and its main channel depth is 13 meters. Ships arriving and departing at the Port of Ensenada transported about 640,000 tons of goods in 2000.

**Source:** Baja California BINS Technical Committee representative.

#### ANALYSIS OF CORRIDOR EVALUATION RESULTS

Of the 12 corridors evaluated in Baja California, the Bellas Artes corridor is listed first - this is one of the corridors that is a local road. Listed #2 is the Mexicali-Ejido Puebla corridor, #3 is Mexicali Progreso, #4 is Mexicali-San Felipe, #5 is Tijuana-Rosarito [free], #6 is Tecate-Ensenada, #7 is Tecate-Tijuana [free], #8 is Tecate-Tijuana [toll], #9 is Bataques-Algodones, #10 is El Hongo-Tecate [free], #11 is Tijuana-Rosarito [toll], and listed #12 or last is the Central Camionera Garita corridor [a local road].

The Bellas Artes corridor obtains its first place listing by being listed first with respect to the historical data and being listed first with respect to the change data.

#### **Historical Data**

This discussion reviews highway, land POE, airport, maritime port and rail data and results. With regard to the highways, the Central Camionera Garita Puerta Mexico is listed first in three of the four highway categories - AADT, LOS and capacity. This corridor dominates the AADT listing with 40,000 - this is twice as large as the corridor listed second [Bellas Artes] and 20 times larger than the corridor listed twelfth [Bataques-Algodones]. Highway length is the only indicator for which the Central Camionera Garita is not listed first - and the Tecate-Ensenada corridor is listed first with 104.5 km.

For truck, airport and maritime port data, the Bellas Artes corridor is always listed first by virtue of the fact that those data are allocated by the distribution of AADT amongst 11 corridors and Bellas Artes has the largest total of the 11 corridors. Trucks do not transit the Central Camionera Garita corridor; therefore, no truck, airport or maritime port data are allocated to it. For passenger vehicles, the Central Camionera Garita corridor is listed first since is has the largest portion of AADT among the 12 corridors and the Bellas Artes corridor is listed second. For railroad cars, the Tecate-Tijuana corridor [G] is listed first since the FFRR Via Corta Tijuana-Tecate rail line is assigned to this corridor. For railroad volume, the Mexicali-Ejido Puebla corridor [E] is listed first since the FFRR-FSBC rail line is assigned to this corridor. Had data for both rail cars and tonnage been provided for both POE, it would impact the corridor scores - but not the final ranking.

# **Change Data**

This discussion reviews highway, land POE, airport, maritime port and rail data for both absolute changes and percent changes. With regard to absolute changes, the Central Camionera Garita dominates the highways mode with the Bellas Artes listed second. With regard to highways, the Central Camionera Garita is listed first for three indicators [AADT, LOS and capacity] and tied for first for highway length.

For truck, airport, and maritime port data, the Bellas Artes corridor is always listed first by virtue of the fact that it supports the highest trade and vehicle volumes for the year 2000, and the growth rates for 11 corridors are the same [the Central Camionera Garita corridor is excluded]. For passenger vehicles, Central Camionera Garita corridor is listed first. For railroad cars, the Tecate-Tijuana corridor [G] is listed first since the FFRR Via Corta Tijuana-Tecate rail line is assigned to this corridor. For railroad volume, the Mexicali-Ejido Puebla corridor [E] is listed first since the FFRR-FSBC

rail line is assigned to this corridor. Had data for both rail cars and tonnage been provided for both POE, it would impact the corridor scores - but not the final listing.

With regard percent changes in highway data, all 12 corridors are tied for first by virtue of the fact that each uses the same annual compound growth rate - 3.0% per year for AADT, LOS and Capacity and no change for highway length.

For trucks, airports and maritime ports, 11 of the corridors are tied for first by virtue of the fact that they use the same growth rates [the Central Camionera Garita corridor is excluded]. For passenger vehicles the 12 corridors are tied. For railroad cars, the Tecate-Tijuana corridor [G] is listed first since the FFRR Via Corta Tijuana-Tecate rail line is assigned to this corridor. For railroad volume, the Mexicali-Ejido Puebla corridor [E] is listed first since the FFRR-FSBC rail line is assigned to this corridor. Had data for both rail cars and tonnage been provided for both POE, it would impact the corridor scores - but not the final listing.

Table 1 **Summary Corridor Results** 

ijuana- losarito [toll] 52 36	Tijuana- Rosarito [free]	Tecate- Tijuana [toll]	Hongo- Tecate [free]	Mexicali - Ejido Puebla	Mexicali- Progreso	Tecate- Tijuana [free]	Tecate- Ensenada	Mexicali -San Felipe	Bataques- Algodones	Central Camionera Garita	Bellas Artes
36		54							90401103	Garita	VI IC2
36		54									
	0.4	J-T	54	42	52	54	36	42	64	28	40
ı	26	28	34	24	20	26	30	24	28	26	6
22	20	16	16	14	12	10	8	6	4	24	2
44	40	32	32	28	24	20	16	12	8	48	4
8	8	8	8	6	8	6	8	8	8	8	8
162	138	138	144	114	116	116	98	92	112	134	60
etween	2000 and	2020 <sup>2</sup>									
25	20	24	27	16	19	28	22	24	34	8	16
15	7	13	19	11	9	17	23	19	25	26	5
7	3	6	9	5	4	8	11	9	12	24	2
14	6	12	18	10	8	16	22	18	24	48	4
8	8	8	8	6	8	6	8	8	8	8	8
69	44	63	81	48	48	75	86	78	103	114	35
231	182	201	225	162	164	191	184	170	215	248	95
11	5	8	10	2	3	7	6	4	9	12	1
e	44 8 162 25 15 7 14 8 69	44 40 8 8 162 138 etween 2000 and 25 20 15 7 7 3 14 6 8 8 69 44 231 182	44     40     32       8     8     8       162     138     138       162     138     138       25     20     24       15     7     13       7     3     6       14     6     12       8     8     8       69     44     63       231     182     201	44     40     32     32       8     8     8     8       162     138     138     144       etween 2000 and 2020²       25     20     24     27       15     7     13     19       7     3     6     9       14     6     12     18       8     8     8     8       69     44     63     81       231     182     201     225	44     40     32     32     28       8     8     8     8     6       162     138     138     144     114       Etween 2000 and 2020²       25     20     24     27     16       15     7     13     19     11       7     3     6     9     5       14     6     12     18     10       8     8     8     6       69     44     63     81     48       231     182     201     225     162	44       40       32       32       28       24         8       8       8       8       6       8         162       138       138       144       114       116         etween 2000 and 2020²         25       20       24       27       16       19         15       7       13       19       11       9         7       3       6       9       5       4         14       6       12       18       10       8         8       8       8       8       6       8         69       44       63       81       48       48         231       182       201       225       162       164	44     40     32     32     28     24     20       8     8     8     8     6     8     6       162     138     138     144     114     116     116       25     20     24     27     16     19     28       15     7     13     19     11     9     17       7     3     6     9     5     4     8       14     6     12     18     10     8     16       8     8     8     8     6       69     44     63     81     48     48     75       231     182     201     225     162     164     191	44     40     32     32     28     24     20     16       8     8     8     8     6     8     6     8       162     138     138     144     114     116     116     98       25     20     24     27     16     19     28     22       15     7     13     19     11     9     17     23       7     3     6     9     5     4     8     11       14     6     12     18     10     8     16     22       8     8     8     6     8     6     8       69     44     63     81     48     48     75     86       231     182     201     225     162     164     191     184	44     40     32     32     28     24     20     16     12       8     8     8     8     6     8     8     8       162     138     138     144     114     116     116     98     92       25     20     24     27     16     19     28     22     24       15     7     13     19     11     9     17     23     19       7     3     6     9     5     4     8     11     9       14     6     12     18     10     8     16     22     18       8     8     8     8     6     8     8       69     44     63     81     48     48     75     86     78       231     182     201     225     162     164     191     184     170	44     40     32     32     28     24     20     16     12     8       8     8     8     8     6     8     6     8     8     8       162     138     138     144     114     116     116     98     92     112       Etween 2000 and 2020²       25     20     24     27     16     19     28     22     24     34       15     7     13     19     11     9     17     23     19     25       7     3     6     9     5     4     8     11     9     12       14     6     12     18     10     8     16     22     18     24       8     8     8     8     6     8     6     8     8     8       69     44     63     81     48     48     75     86     78     103       231     182     201     225     162     164     191     184     170     215	44     40     32     32     28     24     20     16     12     8     48       8     8     8     8     6     8     8     8     8     8       162     138     138     144     114     116     116     98     92     112     134       25     20     24     27     16     19     28     22     24     34     8       15     7     13     19     11     9     17     23     19     25     26       7     3     6     9     5     4     8     11     9     12     24       14     6     12     18     10     8     16     22     18     24     48       8     8     8     8     6     8     8     8     8       69     44     63     81     48     48     75     86     78     103     114       231     182     201     225     162     164     191     184     170     215     248

Lower score represents greater need.

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Historical Scores from Table 2a. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.

<sup>2</sup> 

The Changes Scores is the sum of the Evaluation Results from Table 4a [Corridor Changes] and Table 4a [Corridor Percent Changes]. The Overall Score is the sum of the *Historical Score* and the *Changes Score*. The *Historical Data* scores and the *Changes Between 2000* 3 and 2020 scores are equally weighted

Table 2 Corridor Data For 2000

Corridor Identification:	Α	В	С	D	E	F	G	Н	I	J	K	L
Corridor Name	Tijuana - Rosarito [toll]	Tijuana - Rosarito [free]	Tecate - Tijuana [toll]	Hongo - Tecate [free]	Mexicali - Ejido Puebla	Mexicali - Progreso	Tecate - Tijuana [free]	Tecate - Ensenada	Mexicali - San Felipe	Bataques - Algodones	Central Camionera Garita	Bellas Artes
Highways												
Average Annual Daily	F 100	10 / 00	F 700	4 (00	/ F00	7.000	F 000	4 200	4.700	2.100	40,000	20,000
Traffic	5,100	10,600	5,700	4,600	6,500	7,000	5,000	4,200	4,600	2,100	40,000	20,000
Highway Length [in km]	35.4	25.9	22.7	45.0	12.0	7.8	50.6	104.5	100.0	51.7	7.9	16.3
LOS [A=1 to F3 = 9]	1.0	4.0	1.0	3.0	3.0	2.0	3.0	3.0	2.0	2.0	4.0	4.0
Capacity at Peak Hour	3,200	1,600	3,200	2,000	3,200	3,200	1,600	3,200	3,200	2,000	5,500	2,500
<b>Land Port of Entry Bord</b>	der Crossii	ngs										
Number trucks	62,511	129,925	69,865	56,382	79,671	85,799	61,285	51,480	56,382	25,740	0	245,141
Total volume [tons]												
# passenger veh. & buses	986,815	2,051,027	1,102,910	890,068	1,257,705	1,354,451	967,465	812,671	890,068	406,335	7,739,723	3,869,861
Airports												
Total volume [tons]	5,129	10,661	5,733	4,626	6,537	7,040	5,029	4,224	4,626	2,112	0	20,115
Maritime Ports												
Total volume [tons]	43,271	89,935	48,361	39,028	55,149	59,391	42,422	35,635	39,028	17,817	0	169,689
Total number TEUs	1,952	4,057	2,182	1,761	2,488	2,679	1,914	1,608	1,761	804	0	7,655
Railroads Border Crossi	ng at POE											
Number rail cars							2,419					
Total volume [tons]					335,000							
Total AADT in Corridors <sup>1</sup>					Shar	e of AADT	Among	Corridors				
75,400	6.8%	14.1%	7.6%	6.1%	8.6%	9.3%	6.6%	5.6%	6.1%	2.8%		26.5%
115,400	4.4%	9.2%	4.9%	4.0%	5.6%	6.1%	4.3%	3.6%	4.0%	1.8%	34.7%	17.3%

Source: Baja California BINS Technical Committee Representative, see Tables 6 - 9 for details.

There are 75,400 AADT in 11 corridors [excludes Central Camionera Garita]. This is used to distribute data for trucks, airports and maritime ports. There are 115,400 AADT in all twelve corridors used to distribute passenger vehicles and buses.

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution

Table 2a
Corridor Evaluation Results For 2000

Corridor Evaluation Results For 2000												
Corridor Identification:	Α	В	С	D	E	F	G	Н	ı	J	K	L
Corridor Name	Tijuana Rosarito [toll]	Tijuana Rosarito [free]	Tecate Tijuana [toll]	Hongo Tecate [free]	Mexicali - Ejido Puebla	Mexicali Progreso	Tecate Tijuana [free]	Tecate - Ensenada	Mexicali - San Felipe	Bataques Algodones	Central Camionera Garita	Bellas Artes
Highways												
Average Annual Daily												
Traffic	7	3	6	9	5	4	8	11	9	12	1	2
Highway Length [in km]	6	7	8	5	10	12	4	1	2	3	11	9
LOS [A=1 to F3 = 9]	11	1	11	4	4	8	4	4	8	8	1	1
Capacity at Peak Hour	2	11	2	9	2	2	11	2	2	9	1	8
Highway Scores:	26	22	27	27	21	26	27	18	21	32	14	20
Overall Highway Result:	7	6	9	9	4	7	9	2	4	12	1	3
Land Port of Entry Bord	er Cross	ings										
Number trucks	11	10	8	8	7	6	5	4	3	2	12	1
Total volume [tons]												
# passenger veh. & buses	7	3	6	9	5	4	8	11	9	12	1	2
Land POE Scores:	18	13	14	17	12	10	13	15	12	14	13	3
Overall POE Result:	12	5	8	11	3	2	5	10	3	8	5	1
Airports												
Total volume [tons]	11	10	8	8	7	6	5	4	3	2	12	1
Airport Scores:	11	10	8	8	7	6	5	4	3	2	12	1
Overall Airport Result:	11	10	8	8	7	6	5	4	3	2	12	1
Maritime Ports												
Total volume [tons]	11	10	8	8	7	6	5	4	3	2	12	1
Total number TEUs	11	10	8	8	7	6	5	4	3	2	12	1
Maritime Port Score:	22	20	16	16	14	12	10	8	6	4	24	2
Overall Maritime Result:	11	10	8	8	7	6	5	4	3	2	12	1
Railroads Border Crossin	ng at PO	E	•			•						
Number rail cars	2	2	2	2	2	2	1	2	2	2	2	2
Total volume [tons]	2	2	2	2	1	2	2	2	2	2	2	2
Railroad Scores:	4	4	4	4	3	4	3	4	4	4	4	4
Overall Railroad Result:	3	3	3	3	1	3	1	3	3	3	3	3
Notes: Lower score represents	greater ne	ed		1	1			1				

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Table 3
Corridor Data For 2020

Corridor												
Identification:	Α	В	С	D	E	F	G	Н	I	J	K	L
Corridor Name	Tijuana - Rosarito [toll]	Tijuana - Rosarito [free]	Tecate - Tijuana [toll]	Hongo - Tecate [free]	Mexicali - Ejido Puebla	Mexicali - Progreso	Tecate - Tijuana [free]	Tecate - Ensenada	Mexicali - San Felipe	Bataques - Algodones	Central Camionera Garita	Bellas Artes
Highways												
Average Annual Daily Traffic	9,211	19,145	10,295	8,308	11,740	12,643	9,031	7,586	8,308	3,793	72,244	36,122
Highway Length [in km]	35.4	25.9	22.7	45.0	12.0	7.8	50.6	104.5	100.0	51.7	7.9	16.3
LOS [A=1 to F3 = 9]	1.8	7.2	1.8	5.4	5.4	3.6	5.4	5.4	3.6	3.6	7.2	7.2
Capacity at Peak Hour	5,780	2,890	5,780	3,612	5,780	5,780	2,890	5,780	5,780	3,612	9,934	4,515
Land Port of Entry Bo	rder Cross	sings										
Number trucks	135,663	281,966	151,623	122,363	172,904	186,204	133,003	111,722	122,363	55,861	0	532,012
Total volume [tons]												
# passenger veh. & buses	1,782,286	3,704,359	1,991,967	1,607,552	2,271,541	2,446,275	1,747,339	1,467,765	1,607,552	733,882	13,978,713	6,989,357
Airports												
Total volume [tons]	7,036	14,624	7,864	6,346	8,968	9,657	6,898	5,794	6,346	2,897	0	27,592
Maritime Ports												
Total volume [tons]	269,089	559,282	300,746	242,707	342,956	369,337	263,812	221,602	242,707	110,801	0	1,055,249
Total number TEUs	10,187	21,173	11,385	9,188	12,983	13,982	9,987	8,389	9,188	4,195	0	39,949
Railroads Border Cros	sing at PO	E										
Number rail cars							4,369					
Total volume [tons]					1,744,380							
Total AADT in Corridors <sup>1</sup>					Share	of AADT	Among Co	rridors				
136,180	6.8%	14.1%	7.6%	6.1%	8.6%	9.3%	6.6%	5.6%	6.1%	2.8%		26.5%
208,424	4.4%	9.2%	4.9%	4.0%	5.6%	6.1%	4.3%	3.6%	4.0%	1.8%	34.7%	17.3%
NI - 4												

There are 136,180 AADT in 11 corridors [excludes Central Camionera Garita]. This is used to distribute data for trucks, airports and maritime ports. There are 208,424 AADT in all twelve corridors used to distribute passenger vehicles and buses

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution

Sources: Baja California BINS Technical Committee representative and the Mexican Secretariat of Communications and Transportation. See Tables 6 - 9 for details

Table 3a Corridor Evaluation Results For 2020

COTTUOL EVALUATION RESULTS FOI 2020												
Corridor Identification <sup>1</sup> :	Α	В	С	D	E	F	G	Н	I	J	K	L
Highways												
Average Annual Daily												
Traffic	7	3	6	9	5	4	8	11	9	12	1	2
Highway Length [in km]	6	7	8	5	10	12	4	1	2	3	11	9
LOS [A=1 to F3 = 9]	11	1	11	4	4	8	4	4	8	8	1	1
Capacity at Peak Hour	2	11	2	9	2	2	11	2	2	9	1	8
Highway Scores:	<b>26</b>	22	<b>27</b>	<b>27</b>	21	26	<b>27</b>	18	21	32	14	20
Overall Highway Result:	7	6	9	9	4	7	9	2	4	12	1	3
Land Port of Entry Border	Crossi	ings										
Number trucks	6	2	5	8	4	3	7	10	8	11	12	1
Total volume [tons]												
# passenger veh. & buses	7	3	6	9	5	4	8	11	9	12	1	2
Land POE Scores:	13	5	11	17	9	7	15	21	17	23	13	3
Overall POE Result:	6	2	5	9	4	3	8	11	9	12	6	1
Airports												
Total volume [tons]	6	2	5	8	4	3	7	10	8	11	12	1
Airport Scores:	6	2	5	8	4	3	7	10	8	11	12	1
Overall Airport Result:	7	3	6	9	5	4	8	11	9	12	1	2
Maritime Ports												
Total volume [tons]	6	2	5	8	4	3	7	10	8	11	12	1
Total number TEUs	6	2	5	8	4	3	7	10	8	11	12	1
Maritime Port Score:	12	4	10	16	8	6	14	20	16	22	24	2
Overall Maritime Result:	6	2	5	8	4	3	7	10	8	11	12	1
Railroads Border Crossing	at PO	E										
Number rail cars	2	2	2	2	2	2	1	2	2	2	2	2
Total volume [tons]	2	2	2	2	1	2	2	2	2	2	2	2
Railroad Scores:	4	4	4	4	3	4	3	4	4	4	4	4
Overall Railroad Result:	3	3	1	3	1	3	3	3	3	3	3	3
Notes										•	•	
A Tijuana -Rosarito [toll] G Tecate - Tijuana [free]												
B Tijuana -Rosa	rito [fr	ee]					Н	Tecate	e – Ense	nada		
C Tecate -Tijuai	na [toll]						1	Mexic	ali - Sar	n Felipe		
D Hongo - Teca	te [free	]					J	Bataq	ues - A	lgodone	es	
E Mexicali - Eji	do Puel	ola					K	Centr	al Cami	onera G	arita	
F Mexicali - Pro	ogreso						L	Bellas	Artes			

Table 4 Corridor Changes 2000 - 2020

Corridor Identification:	Α	В	С	D	E	F	G	Н	I	J	K	L
Corridor Name	Tijuana - Rosarito [toll]	Tijuana - Rosarito [free]	Tecate - Tijuana [toll]	Hongo - Tecate [free]	Mexicali - Ejido Puebla	Mexicali - Progreso	Tecate - Tijuana [free]	Tecate - Ensenada	Mexicali - San Felipe	Bataques - Algodones	Central Camionera Garita	Bellas Artes
Highways												
Average Annual Daily Traffic	4,111	8,545	4,595	3,708	5,240	5,643	4,031	3,386	3,708	1,693	32,244	16,122
Highway Length [in km]	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
LOS [A=1 to F3 = 9]	0.81	3.22	0.81	2.42	2.42	1.61	2.42	2.42	1.61	1.61	3.22	3.22
Capacity at Peak Hour	2,580	1,290	2,580	1,612	2,580	2,580	1,290	2,580	2,580	1,612	4,434	2,015
<b>Land Port of Entry Border</b>	Crossing	<b>IS</b>										
Number trucks	73,152	152,042	81,758	65,980	93,233	100,405	71,718	60,243	65,980	30,121	0	286,871
Total volume [tons]												
# passenger veh. & buses	795,471	1,653,332	889,056	717,484	1,013,836	1,091,823	779,874	655,094	717,484	327,547	6,238,990	3,119,495
Airports												
Total volume [tons]	1,907	3,963	2,131	1,720	2,430	2,617	1,869	1,570	1,720	785	0	7,477
Maritime Ports												
Total volume [tons]	225,818	469,347	252,385	203,679	287,807	309,946	221,390	185,968	203,679	92,984	0	885,560
Total number TEUs	8,235	17,116	9,204	7,428	10,496	11,303	8,073	6,782	7,428	3,391	0	32,294
<b>Railroads Border Crossing</b>	at POE											
Number rail cars							1,950					
Total volume [tons]					1,409,380							
Total AADT in Corridors <sup>1</sup>				S	hare of AA	ADT Amon	g Corrid	ors				
60,780	6.8%	14.1%	7.6%	6.1%	8.6%	9.3%	6.6%	5.6%	6.1%	2.8%		26.5%
93,024	4.4%	9.2%	4.9%	4.0%	5.6%	6.1%	4.3%	3.6%	4.0%	1.8%	34.7%	17.3%

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There are 60,780 AADT in 11 corridors [excludes Central Camionera Garita]. This is used to distribute data for trucks, airports and maritime ports. There are 93,024 AADT in all twelve corridors used to distribute passenger vehicles and buses. Differences are estimated by subtracting the year 2000 data from the 2020 projections. See Tables 6 - 9 for details.

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Table 4a Corridor Evaluation Results for Changes 2000 - 2020

	Corridor Evaluation Results for Changes 2000 - 2020													
Corridor Identification <sup>1</sup> :	Α	В	С	D	E	F	G	н	1	J	К	L		
Average Annual Daily														
Traffic	7	3	6	9	5	4	8	11	9	12	1	2		
Highway Length [in km]	1	1	1	1	1	1	1	1	1	1	1	1		
LOS [A=1 to F3 = 9]	11	1	11	4	4	8	4	4	8	8	1	1		
Capacity at Peak Hour	2	11	2	9	2	2	11	2	2	9	1	8		
Highway Scores:	21	16	20	23	12	15	24	18	20	30	4	12		
Overall Highway Result:	9	5	7	10	2	4	11	6 7 12 1 2						
Land Port of Entry Borde	er Cro	ssings												
Number trucks	6	2	5	8	4	3	7	10	8	11	12	1		
Total volume [tons]														
# passenger veh. & buses	7	3	6	9	5	4	8	11	9	12	1	2		
Land POE Scores:	13	5	11	17	9	7	15	21	17	23	13	3		
Overall POE Result:	6	2	5	9	4	3	8	11	9	12	6	1		
Airports										•				
Total volume [tons]	6	2	5	8	4	3	7	10	8	11	12	1		
Airport Scores:	6	2	5	8	4	3	7	10	8	11	12	1		
Overall Airport Result:	6	2	5	8	4	3	7	10	8	11	12	1		
Maritime Ports		•	•		•	•	•	•	•	•	•			
Total volume [tons]	6	2	5	8	4	3	7	10	8	11	12	1		
Total number TEUs	6	2	5	8	4	3	7	10	8	11	12	1		
Maritime Port Score:	12	4	10	16	8	6	14	20	16	22	24	2		
Overall Maritime Result:	6	2	5	8	4	3	7	10	8	11	12	1		
Railroads Border Crossin	ng at P	OE												
Number rail cars	2	2	2	2	2	2	1	2	2	2	2	2		
Total volume [tons]	2	2	2	2	1	2	2	2	2	2	2	2		
Railroad Scores:	4	4	4	4	3	4	3	4	4	4	4	4		
Overall Railroad Result:	3	3	3	3	1	3	1	3	3	3	3	3		
Lower score represents														
greater need.	56	31	50	68	36	35	63	73 65 90 57 22						
Notes	•-						_	_						
A IIJualia -Ros							G			ijuana				
B Tijuana -Ros C Tecate -Tiju							H			nsenad San Fe				
D Hongo - Ted	-	-					ı J			- Algo	-			
E Mexicali - E							K		-	_		ita		
F Mexicali - F	-						L							
	- 3. 30							- Belias Artes						

Table 5 Corridor Percent Changes 2000 - 2020

Corridor Identification:	Α	В	С	D	E	F	G	Н	ı	J	K	L
Corridor Name	Tijuana - Rosarito [toll]	Tijuana - Rosarito [free]	Tecate - Tijuana [toll]	Hongo - Tecate [free]	Mexicali - Ejido Puebla	Mexicali - Progreso	Tecate - Tijuana [free]	Tecate - Ensenada	Mexicali - San Felipe	Bataques - Algodones	Central Camionera Garita	Bellas Artes
Highways												
Average Annual Daily Traffic	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%
Highway Length [in km]	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
LOS [A=1 to F3 = 9]	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%
Capacity at Peak Hour	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%
<b>Land Port of Entry Borde</b>	r Crossin	ngs										
Number trucks	117.0%	117.0%	117.0%	117.0%	117.0%	117.0%	117.0%	117.0%	117.0%	117.0%		117.0%
Total volume [tons]												
# passenger veh. & buses	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%
Airports												
Total volume [tons]	37.2%	37.2%	37.2%	37.2%	37.2%	37.2%	37.2%	37.2%	37.2%	37.2%		37.2%
Maritime Ports												
Total volume [tons]	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%		521.9%
Total number TEUs	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%	521.9%		521.9%
Railroads Border Crossin	g at POE											
Number rail cars							80.6%					
Total volume [tons]					420.7%							
Notes: See Tables 6 - 9	for details.											

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Table 5a Corridor Evaluation Results for Percent Changes 2000 - 2020

Corridor Evaluation Results for Percent Changes 2000 – 2020												
Corridor Identification <sup>1</sup> :	Α	В	С	D	E	F	G	Н	ı	J	K	L
Highways												
Average Annual Daily Traffic	1	1	1	1	1	1	1	1	1	1	1	1
Highway Length [in km]	1	1	1	1	1	1	1	1	1	1	1	1
LOS [A=1 to F3 = 9]	1	1	1	1	1	1	1	1	1	1	1	1
Capacity at Peak Hour	1	1	1	1	1	1	1	1	1	1	1	1
Highway Scores:	4	4	4	4	4	4	4	4	4	4	4	4
Overall Highway Result:	1	1	1	1	1	1	1	1	1	1	1	1
Land Port of Entry Border	Crossi	ngs										
Number trucks	1	1	1	1	1	1	1	1	1	1	12	1
Total volume [tons]												
# passenger veh. & buses	1	1	1	1	1	1	1	1	1	1	1	1
Land POE Scores:	2	2	2	2	2	2	2	2	2	2	13	2
Overall POE Result:	1	1	1	1	1	1	1	1	1	1	12	1
Airports												
Total volume [tons]	1	1	1	1	1	1	1	1	1	1	12	1
Airport Scores:	1	1	1	1	1	1	1	1	1	1	12	1
Overall Airport Result:	1	1	1	1	1	1	1	1	1	1	12	1
Maritime Ports												
Total volume [tons]	1	1	1	1	1	1	1	1	1	1	12	1
Total number TEUs	1	1	1	1	1	1	1	1	1	1	12	1
Maritime Port Score:	2	2	2	2	2	2	2	2	2	2	24	2
Overall Maritime Result:	1	1	1	1	1	1	1	1	1	1	12	1
Railroads Border Crossing	at POE											
Number rail cars	2	2	2	2	2	2	1	2	2	2	2	2
Total volume [tons]	2	2	2	2	1	2	2	2	2	2	2	2
Railroad Scores:	4	4	4	4	3	4	3	4	4	4	4	4
Overall Railroad Result:	3	3	3	3	1	3	1	3	3	3	3	3
Notes:												
<sup>1</sup> A Tijuana -Rosar	ito [to	II]					G	Tec	ate - T	ijuana	[free]	
B Tijuana -Rosar	_	_					Н		cate - E			
C Tecate -Tijuana							I		xicali -		•	
D Hongo - Tecate	e [free]						J	Bat	taques	- Algo	dones	
E Mexicali - Ejid	o Pueb	la					K	Cei	ntral C	amione	era Gar	ita
F Mexicali - Pro	greso						L	Bel	llas Art	es		
Lower score represents greater need.												

Table 6 Highway Data

				Kilomete	ers	Avg. Annual		Service - OS	Traffic-
Corridor ID	Highway	Corridor Name	Begin Post	End Post	Highway Length	Daily Traffic	A to F3	1 to 9	Carrying Capacity
Historical D	ata for Calend	ar Year 2000							
А	MX-1D	Tijuana - Rosarito [cuota]	0.00	35.42	35.42	5,100	Α	1	3,200
В	MX-1	Tijuana - Rosarito [libre]	0.00	25.94	25.94	10,600	D	4	1,600
С	MX-2D	Tecate-Tijuana [cuota]	0.00	22.74	22.74	5,700	Α	1	3,200
D	MX-2	Hongo - Tecate [libre]	87.00	132.00	45.00	4,600	С	3	2,000
Е	MX-2	Mexicali - Ejido Puebla	0.00	12.00	12.00	6,500	С	3	3,200
F	MX-2	Mexicali - Progreso	0.00	7.80	7.80	7,000	В	2	3,200
G	MX-2	Tecate-Tijuana [libre]	132.00	182.60	50.60	5,000	С	3	1,600
Н	MX-3	Tecate - Ensenada [El Sauzal]	0.00	104.53	104.53	4,200	С	3	3,200
I	MX-5	Mexicali - San Felipe	0.00	100.00	100.00	4,600	В	2	3,200
J	BCN-2	Bataques - Algodones	49.65	101.30	51.65	2,100	В	2	2,000
К	via Rapida Oriente	Central Camionera - Garita Puerta Mexico	0.00	7.90	7.90	40,000	D	4	5,500
L	Bellas Artes Blvd	Bellas Artes	0.00	16.25	16.25	20,000	D	4	2,500
Projections	for 2020								
Α	MX-1D	Tijuana - Rosarito [cuota]	0.00	35.42	35.42	9,211	Α	1.81	5,780
В	MX-1	Tijuana - Rosarito [libre]	0.00	25.94	25.94	19,145	F1	7.22	2,890
С	MX-2D	Tecate-Tijuana [cuota]	0.00	22.74	22.74	10,295	Α	1.81	5,780
D	MX-2	Hongo - Tecate [libre]	87.00	132.00	45.00	8,308	E	5.42	3,612
E	MX-2	Mexicali - Ejido Puebla	0.00	12.00	12.00	11,740	E	5.42	5,780
F	MX-2	Mexicali - Progreso	0.00	7.80	7.80	12,643	С	3.61	5,780
G	MX-2	Tecate-Tijuana [libre]	132.00	182.60	50.60	9,031	E	5.42	2,890
Н	MX-3	Tecate - Ensenada [El Sauzal]	0.00	104.53	104.53	7,586	E	5.42	5,780
I	MX-5	Mexicali - San Felipe	0.00	100.00	100.00	8,308	С	3.61	5,780
J	BCN-2	Bataques - Algodones	49.65	101.30	51.65	3,793	С	3.61	3,612
К	via Rapida Oriente	Central Camionera - Garita Puerta Mexico	0.00	7.90	7.90	72,244	F1	7.22	9,934
L	Bellas Artes Blvd	Bellas Artes	0.00	16.25	16.25	36,122	F1	7.22	4,515

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Percent Change: 2000 to 2020
It is assumed that highway length does not change during the 20 year period. All other indicators increase at a compound annual rate of 3.0%. This translates to overall growth of 80.6%

LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Historical data from the Baja California BINS Technical Committee Representative Sources:

Compound Annual Growth Rate of 3.0% per year: Mexican Secretariat of Communications and Transportation [SCT]

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Table 7
Land Ports Of Entry [POE] Crossing Data

	Algondones	Mexicali	Mexicali- Este	Puerta Mexico	Mesa de Otay	Tecate	Total
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	Yes	Yes	
Southbound POE Crossing Data for	or 2000¹						
Number trucks					819,060	105,120	924,180
Tons of goods							0
Value [Millions \$] moved by truck							\$0.0
Number of passenger vehicles				20,380,000		1,949,100	22,329,100
Number of buses							0
Number passenger vehicles & buses				20,380,000		1,949,100	22,329,100
Number of rail cars				2,419			X
Volume of tons moved by rail		335,000					X
Number of TEUs moved by rail							X
Value [Millions \$] moved by rail							X
Southbound POE Crossing Data for	or 2020						
Number trucks <sup>2</sup>					1,777,550	228,135	2,005,685
Tons of goods							
Value [Millions \$] moved by truck							
Number of passenger vehicles							X
Number of buses							X
Number passenger vehicles & buses <sup>3</sup>							40,328,588
Number of rail cars <sup>3</sup>				4,369			X
Volume of tons moved by rail <sup>1</sup>		1,744,380					X
Number of TEUs moved by rail							X
Value [Millions \$] moved by rail							X
Per Cent Change in POE Data: 200	00 to 2020						
Number trucks <sup>2</sup>							117.0%
Tons of goods							
Value [Millions \$] moved by truck							
Number of passenger vehicles							X
Number of buses							X

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	Algondones	Mexicali	Mexicali- Este	Puerta Mexico	Mesa de Otay	Tecate	Total
Number passenger vehicles & buses <sup>4</sup>							80.6%
Number of rail cars <sup>4</sup>				80.6%			X
Volume of tons moved by rail <sup>5</sup>		420.7%					X
Number of TEUs moved by rail							Х
Value [Millions \$] moved by rail							X

Number of trucks = southbound trucks that cross the US-Mexico border

Tons of goods = carried by southbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by southbound trucks that cross the US-Mexico border.

Number of passenger vehicles = southbound passenger vehicles that cross the US-Mexico border.

Number of buses = southbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of southbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = southbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by the southbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are southbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by southbound rail cars that cross the US-Mexico border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- From Baja California BINS Technical Committee representative.
- The BINS Technical Committee representative provided the 2020 projections for the Mesa de Otay POE. The growth rate from that forecast is estimated at 117.0% and is used to project the 2020 truck crossings at Tecate
- 3 Computed by multiplying the 2000 data by the 80.6% growth rate and adding the result to the 2000 data.
- This 80.6% growth rate is based on a compound annual growth rate of 3.0% the level specified by the Mexican Secretariat of Communications and Transportation
- <sup>5</sup> Estimated by subtracting the 2000 rail tonnage from the 2020 projections, and dividing the result by the 2000 rail tonnage.

Table 8
Airport Data

	San Felipe	Mexicali	Tijuana	Total
Within 100 km of the US-Mexico Border?	No	Yes	Yes	
Designated as an International POE?	Yes	Yes	Yes	
Historical Data for 2000				
Longest runway length [in meters].		2,600	2,600	2,600
Tons of goods exported & imported		7,565	68,268	75,833
Airport served by railroad facility?		No	No	Χ
If yes, name of railroad				Х
On-land movement of air freight	Х	Х	Х	Х
Share of goods moved by truck				Х
Share of goods moved by railroad				Х
Projections for 2020				
Longest runway length				
Date becomes operational				Χ
Tons of goods exported & imported		9,609	94,414	104,023
Airport served by railroad facility?				Χ
If yes, name of railroad				Χ
On-land movement of air freight	Х	Х	Х	Х
Share of goods moved by truck				
Share of goods moved by railroad				
Per Cent Change: 2000 to 2020				
Longest runway length				
Tons of goods exported & imported				37.2%

**Note:** Only data for facilities that meet minimum criteria are included

**Source:** Baja California BINS Technical Committee representative

Table 9 Maritime Port Data

Within 100 km of the US-Mexico Border?	Yes					
Designated as an International POE?	Yes					
			Changes 2000 to 2020			
	2000	2020	Absolute	Percent		
Main Channel Depth [in meters]	13					
Total tons of goods exported & imported	639,727	3,978,289	3,338,562	521.9%		
Total number TEUs exported & imported	28,859	150,607	121,748	521.9%		
Maritime ports served by railroad facility?	N	Υ				
If yes, name of railroad						
On-land movement of air freight	Х	Х	X	Х		
Share of goods moved by truck	100%					
Share of goods moved by railroad						

#### Note:

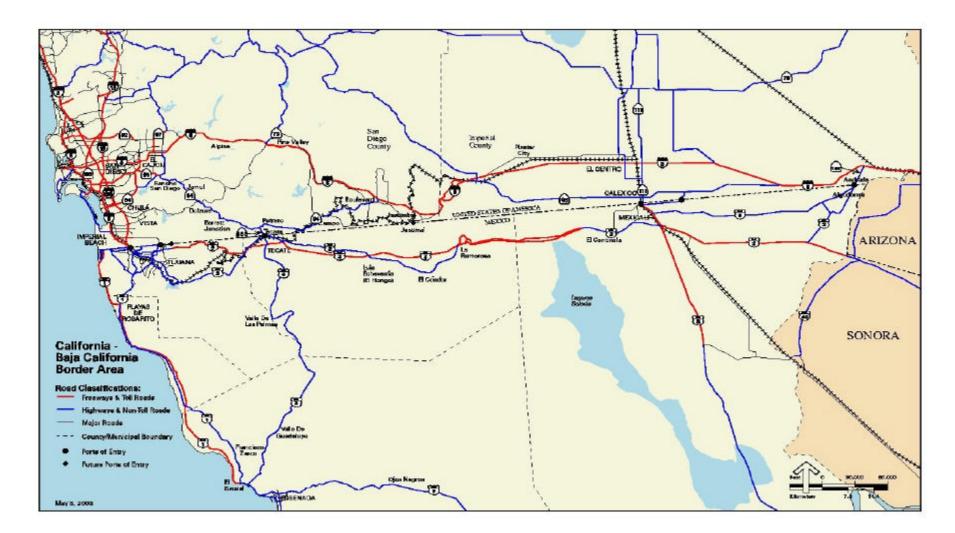
Only data for the port of Ensenada are included in the evaluation as Ensenada meets both minimum criteria. There are maritime ports at Rosarito and Sauzal that are not included because they are not designated as international ports of entry.

#### Sources:

Historical data: Baja California BINS Technical Committee representative.

Forecast data: Tons projections provided by the Baja California BINS Technical Committee representative.

For TEU, the tonnage growth rate [521.9%] is used to obtain the TEU projections.



Map 1 Baja California Border Area

# CORRIDOR EVALUATION CALIFORNIA RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

#### GENERAL DESCRIPTION OF CALIFORNIA'S CORRIDORS

#### **Corridors**

California has identified two corridors for the study and they are called the San Diego-Tijuana-Tecate corridor, and the Imperial-Mexicali corridor. Both corridors run North-South.

#### **Highways**

The San Diego-Tijuana-Tecate corridor is composed of nine highways: Interstate 5 [I-5], I-8, I-15, I-805, SR 11, SR 94, SR 125, SR 188 and SR 905. The Imperial-Mexicali corridor is composed of eight highways: Interstate 8 [I-8], I-10, SR 78, SR 86, SR 98, SR 111, SR 115 and SR 186.

#### **Land Ports of Entry [POE]**

There are six land POEs in California: San Ysidro, Otay Mesa, Tecate, Calexico, Calexico East and Andrade. In calendar year 2000, about 1 million trucks carrying about 3.6 million tons of goods were transported into California through four land POEs. Also in calendar year 2000, about 30 million passenger vehicles crossed the border into California through the six land POEs.

#### **Airports**

There are six airports located within 100 km of the US-Mexico border, but only Lindbergh Field is included in this evaluation because it is the only airport designated as an international port of entry. The longest runway at Lindbergh Field is 9,400 feet in length. During calendar year 2000, airplanes arriving and departing at Lindbergh field transported about 102,600 tons of goods.

#### Railroads

There are three railroads that operate within 100 km of the US-Mexico border and they are the Burlington Northern Santa Fe [BNSF], the San Diego and Imperial Valley [SDIV], and the Union Pacific [UP]. The BNSF and SDIV both operate in the San Diego-Tijuana-Tecate corridor. The UP operates in the Imperial-Mexicali corridor. The rail lines of the SDIV cross the US-Mexico border at the San Ysidro POE. In 2000 there were 202 rail cars that crossed the border into the United States at the San Ysidro POE transporting about 9,700 tons of goods. The rail lines of the UP cross the US-Mexico border at the Calexico POE. In 2000 there were 246 rail cars that crossed the border into the United States at Calexico transporting about 78,600 tons of goods.

#### **Maritime Ports**

California has one maritime port located within 100 km of the US-Mexico border and designated as an international port of entry. That port is the Port of San Diego with a main channel depth of 42 feet. Ships arriving and departing at the Port of San Diego transported about 2 million tons of goods in 2000.

#### ANALYSIS OF CORRIDOR EVALUATION RESULTS

Of the two corridors evaluated in California, the San Diego-Tijuana-Tecate corridor [or the San Diego corridor] is listed first overall with the Imperial-Mexicali corridor [Imperial corridor] listed second. The San Diego corridor obtains its first place listing by being listed first with respect to the historical data, and being listed first with respect to the change data.

#### **Historical Data**

This discussion reviews highway, land POE, airport, maritime port and rail data and results. With regard to the highways, the San Diego corridor is listed first. This comes about because the San Diego corridor is listed first in three categories [AADT, LOS and capacity] and the Imperial corridor is listed first in one category [highway length]. The San Diego corridor had almost eight [8] times as much AADT as the Imperial corridor [719,972 to 92,755], 77% more highway capacity [42,177 versus 23,871] and its LOS is significantly lower [C versus A]. By contrast, the Imperial corridor has 29% more mileage than the San Diego corridor [377.8 miles versus 292.4 miles].

For truck data, passenger vehicles, airports, and maritime ports, the San Diego corridor is always listed first by virtue of the fact that those data are distributed by the distribution of AADT amongst the corridors. For railroad data, the Imperial corridor is always listed first because the number of rail cars and the amount of goods transported in the Imperial corridor by Union Pacific is larger than the number of rail cars and goods transported by the San Diego Imperial Valley railroad in the San Diego corridor.

### **Change Data**

This discussion reviews highway, land POE, airport, maritime port and rail data for both absolute changes and percent changes. With regard absolute changes in highway data, the San Diego corridor is listed first in three of the four categories [AADT, highway length and capacity] implying the absolute changes were larger in the San Diego corridor. In the case of LOS, the LOS rating for the Imperial corridor declined more than the LOS rating for the San Diego corridor.

For trucks, passenger vehicles, airports, and maritime ports data, the San Diego corridor is always listed first by virtue of the fact that the growth rates for both corridors are the same, and the San Diego corridor had larger volumes in the year 2000. For railroad data, the Imperial corridor is always listed first for a similar reason. The growth rates are the same for both railroads, but the Union Pacific [in the Imperial corridor] had larger volumes in calendar year 2000 than the San Diego Imperial Valley railroad [San Diego corridor] had in the year 2000.

With regard percent changes in highway data, the San Diego and Imperial corridor are tied for first by virtue of the fact that each is listed first in two categories. The San Diego corridor is listed first with regard to the larger percent increase in highway length [4.8% versus 1.3%] and capacity [42.0% versus 8.2%]. The Imperial corridor is listed first with regard to AADT [101% growth versus 40%] and LOS [a decline of 40.5% versus a decline of 7.5%].

For trucks, passenger vehicles, airports, maritime ports, and railroad data, the San Diego and Imperial corridor are always tied for first by virtue of the fact that they used the same growth rates.

Table 1 **Summary Corridor Results** 

	Co	rridor Scores <sup>1</sup>		Evalu	ation R	esults
	A San Diego- Tijuana- Tecate	B Imperial- Mexicali	С	Α	В	С
Historical Data for 2000 <sup>2</sup>						
Highways	10	14		1	2	
Land Ports of Entry	8	16		1	2	
Airports	2	4		1	2	
Maritime Ports	2	4		1	2	
Railroads	16	8		2	1	
Sum of Historical Scores:	38	46		1	2	
Changes Between 2000 and 2020 <sup>3</sup>						
Highways	11	13		1	2	
Land Ports of Entry	8	12		1	2	
Airports	2	3		1	2	
Maritime Ports	2	3		1	2	
Railroads	12	8		2	1	
Sum of Change Scores:	35	39		1	2	
Overall Scores <sup>4</sup> :	73	85				
Overall Result:	1	2				

#### Notes:

- The Corridor Scores are the Evaluation Results in Tables 2, 4 and 5. Historical Scores from Table 2. To insure equal weighting with the Changes scores, the *Historical* corridor scores are multiplied by two.
- The Changes Scores is the sum of the Evaluation Results from Table 4 [Corridor Changes] and Table 5 [Corridor Percent Changes].
- The Overall Score is the sum of the *Historical Score* and the *Changes Score*. The *Historical Data* scores and the *Changes Between 2000 and 2020* scores are equally weighted.

Table 2 Corridor Data and Results For 2000

	С	orridor Raw Da	ta	Evalu	ation R	esults
	A San Diego- Tijuana- Tecate	B Imperial- Mexicali	С	A	В	С
Highways						
Average Annual Daily Traffic	719,972	92,755		1	2	
Highway Length [in miles]	292.40	377.80		2	1	
LOS [A=1 to F3 = 9]	3.922	1.330		1	2	
Capacity at Peak Hour	42,177	23,871		1	2	
		Highway Scor	es	5	7	
		Overall Highway Result		1	2	
<b>Land Port of Entry Border Crossing</b>						
Number trucks	910,694	117,326		1	2	
Total volume [tons]	3,162,134	407,383		1	2	
Value of goods Millions \$	\$14,121	\$1,819		1	2	
# passenger vehicles & buses	26,566,907	3,422,661		1	2	
		POE Scores		4	8	
		Overall POE R	esult	1	2	
Airports						
Total volume [tons]	94,168	12,132		1	2	
		Airport Scores		1	2	
		Overall Airpo	rt Result	1	2	
Maritime Ports		•				
Total volume [tons]	1,803,950	232,406		1	2	
Total number TEUs						
		Maritime Port	t Score	1	2	
		Overall Marit	ime Result	1	2	
Railroads Border Crossing at POE						
Number rail cars	202	246		2	1	
Total volume [tons]	9,676	78,632		2	1	
Total Number TEUs	3,874	5,779		2	1	
Value of goods Millions \$	\$1.0	\$22.8		2	1	
-		Railroad Score	es	8	4	
		Overall Railro	2	1		
Total AADT in Two Corridors	Share of	AADT Among	Corridors			
812,728	88.6%	11.4%	0.0%			

#### Notes:

 ${\tt POE, Airport\ \&\ Maritime\ port\ data\ are\ assigned\ to\ Corridors\ based\ on\ AADT\ distribution}.$ 

 $Historical\ data\ from\ California\ BINS\ Technical\ Committee\ representative,\ see\ Tables\ 6-9\ for\ details.$ 

Table 3 **Corridor Data and Results For 2020** 

	Co	rridor Raw Dat	a		aluatio	n
	A San Diego- Tijuana- Tecate	B Imperial- Mexicali	С	Α	В	С
Highways						
Average Annual Daily Traffic	1,008,392	186,422		1	2	
Highway Length [in miles]	306.30	382.80		2	1	
LOS [A=1 to F3 = 9]	4.216	1.868		1	2	
Capacity at Peak Hour	59,891	25,830		1	2	
, ,		Highway Score	es	5	7	
		Overall High		1	2	
Land Port of Entry Border Crossing						
Number trucks	1,478,428	273,318		1	2	
Total volume [tons]	5,133,434	949,023		1	2	
Value of goods Millions \$	\$41,543	\$7,680		1	2	
# passenger vehicles & buses	43,633,792	8,066,624		1	2	
, 3		POE Scores		4	8	
		Overall POE	Result	1	2	
Airports						
Total volume [tons]	299,779	55,421		1	2	
		Airport	Scores	1	2	
		Overall Airpo		1	2	
Maritime Ports		•				
Total volume [tons]	2,740,507	506,640		1	2	
Total number TEUs						
		Maritime Port	Score	1	2	
		Overall Marit	time Result	1	2	
Railroads Border Crossing at POE						
Number rail cars	379	462		2	1	
Total volume [tons]	18,171	147,671		2	1	
Total Number TEUs	7,275	10,853		2	1	
Value of goods Millions \$	\$2.7	\$60.5		2	1	
-		Railroad Score	es	8	4	
		Overall Railre	oad Result	2	1	
Total AADT in Two Corridors	Share of A	AADT Among C	Corridors			
1,194,814	84.4%	15.6%	0.0%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Forecasts for highway, airport and maritime port data are from the California BINS Technical Committee representative. See Tables 6, 8 and 9 for details. Other forecasts are derived from secondary sources. See Table 6 for details.

Table 4 Corridor Changes and Results, 2000 - 2020

	С	orridor Raw Dat	a		aluati Result	
	A San Diego- Tijuana- Tecate	B Imperial- Mexicali	С	Α	В	С
Highways						
Average Annual Daily Traffic	288,419	93,667		1	2	
Highway Length [in miles]	13.90	5.00		1	2	
LOS [A=1 to F3 = 9]	0.294	0.539		2	1	
Capacity at Peak Hour	17,714	1,959		1	2	
		Highway Scores		5	7	
		Overall Highwa	ay Result	1	2	
<b>Land Port of Entry Border Crossing</b>						
Number trucks	546,307	177,419		1	2	
Total volume [tons]	1,896,902	616,038		1	2	
Value of goods Millions \$	\$25,124	\$8,159		1	2	
# passenger vehicles & buses	12,883,001	1,138,451		1	2	
		POE Scores		4	8	
		Overall POE Re	sult	1	2	
Airports						
Total volume [tons]	187,883	61,017		1	2	
		Airport Scores		1	2	
		Overall Airpor	t Result	1	2	
Maritime Ports						
Total volume [tons]	913,970	296,821		1	2	
Total number TEUs						
		Maritime Port	Score	1	2	
		Overall Maritin	ne Result	1	2	
Railroads Border Crossing at POE						
Number rail cars	177	216		2	1	
Total volume [tons]	8,495	69,039		2	1	
Total Number TEUs	3,401	5,074		2	1	
Value of goods Millions \$	\$1.7	\$37.7		2	1	
		Railroad Score	s	8	4	
		Overall Railroa	nd Result	2	1	
Total AADT in Two Corridors	Share of	<b>AADT Among C</b>				
382,087	75.5%	24.5%	0.0%			

#### Notes:

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Differences are estimated by subtracting the year 2000 data from the 2020 projections. See Tables 5 - 8 for details.

Table 5 Corridor Percent Changes and Results, 2000 - 2020

	Co	orridor Raw Data		aluati Result	
	A San Diego- Tijuana- Tecate	B ( Imperial- Mexicali	A	В	С
Highways					
Average Annual Daily Traffic	40.1%	101.0%	2	1	
Highway Length [in miles]	4.8%	1.3%	1	2	
LOS [A=1 to F3 = 9]	7.5%	40.5%	2	1	
Capacity at Peak Hour	42.0%	8.2%	1	2	
		Highway Scores	6	6	
		Overall Highway Result	t 1	1	
Land Port of Entry Border Crossing					
Number trucks	170.4%	170.4%	1	1	
Total volume [tons]	170.4%	170.4%	1	1	
Value of goods Millions \$	308.8%	308.8%	1	1	
# passenger vehicles & buses	72.4%	72.4%	1	1	
		POE Scores	4	4	
		Overall POE Result	1	1	
Airports					
Total volume [tons]	234.1%	234.1%	1	1	
		Airport Scores	1	1	
		<b>Overall Airport Result</b>	1	1	
Maritime Ports					
Total volume [tons]	59.5%	59.5%	1	1	
Total number TEUs					
		Maritime Port Score	1	1	
		Overall Maritime Resul	t 1	1	
Railroads Border Crossing at POE					
Number rail cars	187.8%	187.8%	1	1	
Total volume [tons]	187.8%	187.8%	1	1	
Total Number TEUs	187.8%	187.8%	1	1	
Value of goods Millions \$	265.3%	265.3%	1	1	
		Railroad Scores	4	4	
		Overall Railroad Result	1	1	

#### Notes:

See Tables 6 - 9 for details.

Table 6 Highway Data

	I-5	I-8	a for the	I-805	SR 11	SR 94	SR 125	SR 188	SR 905	Total
AADT:	172,043	68,163	148,330	187,041	0	51,639	40,969	6,700	45,088	719,972
Highway	72.40	77.80	54.30	28.00	0.00	37.60	11.20	1.90	9.20	292.40
Length:		_		_			_	_	_	
LOS:	D	В	D	D		C	D	В	В	С
LOS #:	4.7	2.6	4.6	4.8		3.5	4.6	2.0	3.0	
Weighted Average LOS:	1.2	0.7	0.9	0.5	0.0	0.4	0.2	0.0	0.1	3.9
Capacity:	8,300	5,153	8,065	9,041	0	3,833	2,568	2,000	3,217	42,177
	Summ	ary Dat	a for the	San Die	go-Tijua	na-Teca	ite Corri	dor for 2	020	
	I-5	I-8	I-15	I-805	SR 11	SR 94	SR 125	SR 188	SR 905	Total
AADT:	230,033	70,758	179,199	231,343	40,500	61,667	99,830	17,811	77,252	1,008,392
Highway Length:	72.40	77.80	54.30	28.00	2.70	37.60	22.40	1.90	9.20	306.30
LOS:	F0	В	С	Е	В	С	С	В	В	D
LOS #:	6.7	2.6	3.3	5.9	2.0	3.4	4.0	2.7	2.8	
Weighted Average LOS:	1.6	0.7	0.6	0.5	0.0	0.4	0.3	0.0	0.1	4.2
Capacity:	8,860	5,594	10,961	9,396	4,400	4,828	7,080	2,400	6,370	59,891
-	Su	ımmarv	Data for	the Imp	erial-Me	exicali C	orridor	for 2000		
	I-8	I-10	SR 7	SR 78	SR 86	SR 98	SR 111	SR 115	SR 186	Total
AADT:	12,067	23,244	9,700	2,766	11,044	10,999	13,219	2,416	7,300	92,755
Highway Length:	97.00	131.30	1.20	21.00	48.90	11.80	32.50	32.00	2.10	377.80
LOS:	Α	Α	В	В	А	В	А	В	В	Α
LOS #:	1.0	1.0	2.0	2.0	1.5	2.2	2.0	2.0	2.0	
Weighted Average LOS:	0.3	0.3	0.0	0.1	0.2	0.1	0.2	0.2	0.0	1.3
Capacity:	4,000	4,786	2,400	2,023	2,430	2,020	2,160	2,051	2,000	23,871
	Su	ımmary	Data for	the Imp	erial-Me	exicali C	orridor	for 2020		
	I-8	I-10	SR 7	SR 78	SR 86	SR 98	SR 111	SR 115	SR 186	Total
AADT:	18,179	60,150	26,558	4,269	17,526	19,918	24,167	5,655	10,000	186,422
Highway Length:	97.00	131.30	6.70	21.00	48.90	11.80	32.00	32.00	2.10	382.80
	Α	В	С	А	Α	В	В	В	С	Α
LOS:		2.3	3.4	1.9	1.7	2.4	2.3	2.1	3.0	
LOS: LOS #:	1.0	2.0					1	i		
	0.3	0.8	0.1	0.1	0.2	0.1	0.2	0.2	0.0	1.9

Table 7
Land Ports of Entry [POE] Crossing Data

	San Ysidro	Otay Mesa	Tecate	Calexico	Calexico E	Andrade	Total
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	Yes	Yes	
Northbound POE Crossing Data for 2	2000¹						
Number trucks	0	683,703	61,707	0	281,032	1,578	1,028,020
Tons of goods	0	2,265,250	242,163	0	1,062,104	0	3,569,517
Value [Millions \$] moved by truck	\$0.0	\$10,650.0	\$488.0	\$0.0	\$4,800.0	\$2.1	\$15,940.1
Number of passenger vehicles	14,054,104	4,855,639	1,149,431	6,823,029	2,337,807	617,787	29,837,797
Number of buses	104,040	45,688	544	1,249	173	77	151,771
Number passenger vehicles & buses	14,158,144	4,901,327	1,149,975	6,824,278	2,337,980	617,864	29,989,568
Number of rail cars	202	0	0	246	0	0	X
Volume of tons moved by rail	9,676	0	0	78,632	0	0	X
Number of TEUs moved by rail	3,874	0	0	5,779	0	0	X
Value [Millions \$] moved by rail	\$1.0	0	0	\$22.8	0	0	X
Northbound POE Crossing Data for 2	2020 <sup>2</sup>						
Number trucks							1,751,746
Tons of goods							6,082,457
Value [Millions \$] moved by truck							\$49,223.0
Number of passenger vehicles							X
Number of buses							X
Number passenger vehicles & buses							51,700,416
Number of rail cars	379			462			X
Volume of tons moved by rail	18,171			147,671			X
Number of TEUs moved by rail	7,275			10,853			X
Value [Millions \$] moved by rail	\$2.7			\$60.5			X
Per Cent Change in POE Data: 2000 t	to 2020						
Number trucks <sup>3</sup>							170.4%
Tons of goods <sup>3</sup>							170.4%
Value [Millions \$] moved by truck <sup>3</sup>							308.8%
Number of passenger vehicles							X
Number of buses							X

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Number passenger vehicles & buses <sup>4</sup>				72.4%
Number of rail cars <sup>5</sup>	187.8%	187.8%		X
Volume of tons moved by rail <sup>5</sup>	187.8%	187.8%		X
Number of TEUs moved by rail <sup>5</sup>	187.8%	187.8%		X
Value [Millions \$] moved by rail <sup>5</sup>	265.3%	265.3%		X

#### **Notes**

Number of trucks = northbound trucks that cross the US-Mexico border

Tons of goods = carried by northbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by northbound trucks that cross the US-Mexico border.

Number of passenger vehicles = northbound passenger vehicles that cross the US-Mexico border.

Number of buses = northbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of northbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = northbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by the northbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are northbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by northbound rail cars that cross the US-Mexico border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- From California BINS Technical Committee representative.
- Derived by multiplying the 2000 data by the growth rates.
- The growth rates for trucks, tons and dollars are derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, Freight Transportation Profile California". There are absolute values forecast for the year 2020 for tons and dollars with 1998 data as the base year. Growth rates are calculated for the 22 year period, and 20 year growth rates are estimated. These 20-year growth rates are the ones used in this table. For tons and trucks the compound annual growth rate is 2.7%. For the value of goods moved by truck, the compound annual growth rate is 5.8%.
- The growth rate for passenger vehicles and buses is the same as that observed for the change in Average Annual Daily Traffic [AADT] in the highway segments nearest the US-Mexico border. These AADT data were obtained for I-5, SR 7, SR 11, SR 111, SR 186, SR 188 and SR 905 from the California BINS Technical Committee representative. The total change in AADT was 152,204 or 72.4%. The 72.4% is used to forecast the number of border crossings for passenger vehicles and buses in 2020.
- The growth rates for rail cars, tons, TEUs & dollars are derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, "Freight Transportation Profile California". There are absolute values forecast for the year 2020 for tons and dollars with 1998 data as the base year. Growth rates are calculated for the 22 year period, and 20 year growth rates are estimated. These 20-year growth rates are the ones used in this table. For rail cars, tons of goods moved, and TEUs moved, the compound annual growth rate is 3.2%. For the value of goods moved by rail the compound annual growth rate is 5.0%.

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Table 8 Airport Data

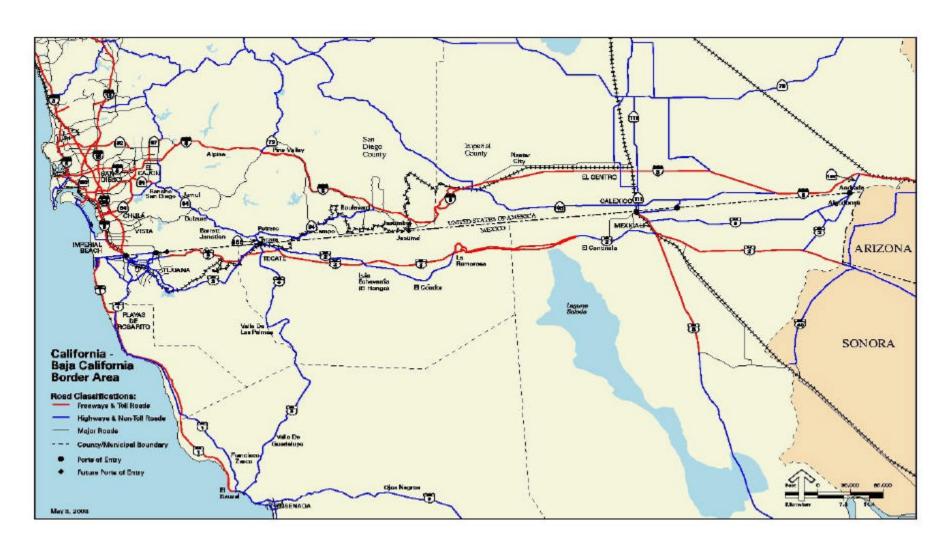
	Lindbergh	Brown	Calexico	Imperial	Gillespie	Montgomery	Total
Within 100 km of the US-Mexico Border?	Yes	Yes	Yes	Yes	Yes	Yes	
Designated as an International POE?	Yes	No	No	No	No	No	
Historical Data for 2000							
Longest runway length	9,400						9,400
Tons of goods exported & imported	106,300						106,300
Airport served by railroad facility?	N						Х
If yes, name of railroad							Χ
On-land movement of air freight	Х	Χ	Х	Х	Х	Х	Χ
Share of goods moved by truck							Χ
Share of goods moved by railroad							Χ
Projections for 2020							
Longest runway length							
Date becomes operational							Х
Tons of goods exported & imported	355,200						355,200
Airport served by railroad facility?							Х
If yes, name of railroad							Х
On-land movement of air freight	Х	Χ	Х	Х	Х	Х	Х
Share of goods moved by truck							
Share of goods moved by railroad							
Per Cent Change: 2000 to 2020							
Longest runway length							
Tons of goods exported & imported							234.1%

**Note:** Only data for facilities that meet minimum criteria are included.

Table 9 Maritime Port Data

Within 100 km of the US-Mexico Border?	Yes							
Designated as an International POE?	Yes							
			Changes 2000 to 2020					
	2000	2020	Absolute	Percent				
Main Channel Depth	42							
Total tons of goods exported & imported	2,036,356	3,247,147	1,210,791	59.5%				
Total number TEUs exported & imported	0							
Maritime ports served by railroad facility?	Υ							
If yes, name of railroad	BNSF							
On-land movement of air freight	Х	Х	Х	Х				
Share of goods moved by truck								
Share of goods moved by railroad								
Sources: California BINS Technical Committee re	presentative.							

Map 1 California Border Area



#### **CALIFORNIA HIGHWAY DATA**

# Methodology For Calculating Corridor Averages for Average Annual Daily Traffic [AADT], Level of Service [LOS], and Peak Hour Traffic Carrying Capacity

Corridor totals for highways are obtained for highway length, AADT, LOS and Peak Hour Traffic Carrying Capacity. The corridor total for each of these indicators is obtained by adding the data for each of the highways assigned to the corridor. The State BINS Technical Committee representative assigned the highways to the corridors. Each of the compilations for each of the indicators is now reviewed.

**Highway Length**—the length of each highway within the 100 km limit. The length is obtained for each highway by subtracting the beginning mile marker, from the last mile marker. If segments are omitted, those segments and their data are omitted from the highway total. The highway length for the entire corridor is obtained by summing the highway length for each highway in the corridor.

**Weighted Average**—an average in which each of the observations is multiplied [or "weighted"] by a factor before calculations. In addition, these weights sum to unity or one [1]. Weighted averages are used so that short and long segments of roadway are counted proportionately in calculating the average for the entire highway.

Average Annual Daily Traffic—the weighted average AADT for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the AADT for that segment to obtain the weighted AADT for the segment. Step 3: The weighted AADT for all the segments are summed to obtain the weighted average AADT for the highway. The weighted average AADT for all the highways in the corridor are then summed to obtain the Corridor Total AADT.

**Level of Service**—the weighted average LOS for each highway is calculated in the same manner as that used for AADT. A major difference is that LOS is provided in the letters A, B, C, D, E, F0, F1, F2 and F3. These letters are converted to numbers using the following system, A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, and F3=9. After the conversions the following steps are used to calculate LOS for each highway. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the LOS number for that segment to obtain the weighted LOS number for all the segments are summed to obtain the weighted average LOS for the highway. The weighted average LOS number for all the highways in the corridor are then summed to obtain the Corridor Total LOS.

**Peak Hour Traffic Carrying Capacity [PCAP]**—the weighted average PCAP for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the PCAP for that segment to obtain the weighted PCAP for the segment. Step 3: The weighted PCAP for all the segments are summed to obtain the weighted average PCAP for the highway. The weighted average PCAP for all the highways in the corridor are then summed to obtain the Corridor Total PCAP.

## HIGHWAY DATA COMPILED INTO CORRIDOR FORM USED IN TABLE 6 OF CORRIDOR EVALUATION FOR CALIFORNIA

Segment Length Is the Basis for Estimating The Weighted Average for AADT, Los And Capacity.

Table 1
Summary Corridor Results

Summary Da	ta for the S	an Diego	/ Tijuana /1	Tecate Corr	idor for 2	000				
	I-5	I-8	I-15	I-805	SR 11	SR 94	SR 125	SR 188	SR 905	Total
AADT:	172,043	68,163	148,330	187,041	0	51,639	40,969	6,700	45,088	719,972
Highway Length:	72.4	77.8	54.3	28.0	0.0	37.6	11.2	1.9	9.2	292.4
LOS:	D	В	D	D		С	D	В	В	С
LOS #:	4.7	2.6	4.6	4.8		3.5	4.6	2.0	3.0	
Weighted Average LOS:	1.2	0.7	0.9	0.5	0.0	0.4	0.2	0.0	0.1	3.9
Capacity:	8,300	5,153	8,065	9,041	0	3,833	2,568	2,000	3,217	42,177
Summary Da	ta for the S	an Diego	/ Tiiuana /	ecate Corr	idor for 2	020				
<u> </u>	I-5	I-8	I-15	I-805	SR 11	SR 94	SR 125	SR 188	SR 905	Total
AADT:	230,033	70,758	179,199	231,343	40,500	61,667	99,830	17,811	77,252	1,008,392
Highway Length:	72.4	77.8	54.3	28.0	2.7	37.6	22.4	1.9	9.2	306.3
LOS:	F0	В	С	E	В	С	С	В	В	D
LOS #:	6.7	2.6	3.3	5.9	2.0	3.4	4.0	2.7	2.8	
Weighted Average LOS:	1.6	0.7	0.6	0.5	0.0	0.4	0.3	0.0	0.1	4.2
Capacity:	8,860	5,594	10,961	9,396	4,400	4,828	7,080	2,400	6,370	59,891
Summary Da	ta for the l	mperial /	Mexicali Co	orridor for	2000					
	I-8	I-10	SR 7	SR 78	SR 86	SR 98	SR 111	SR 115	SR 186	Total
AADT:	12,067	23,244	9,700	2,766	11,044	10,999	13,219	2,416	7,300	92,755
Highway Length:	97.0	131.3	1.2	21.0	48.9	11.8	32.5	32.0	2.1	377.8
LOS:	А	А	В	В	А	В	Α	В	В	A
LOS #:	1.0	1.0	2.0	2.0	1.5	2.2	2.0	2.0	2.0	
Weighted Average LOS:	0.3	0.3	0.0	0.1	0.2	0.1	0.2	0.2	0.0	1.3
Capacity:	4,000	4,786	2,400	2,023	2,430	2,020	2,160	2,051	2,000	23,871

	I-8	I-10	SR 7	SR 78	SR 86	SR 98	SR 111	SR 115	SR 186	Total
AADT:	18,179	60,150	26,558	4,269	17,526	19,918	24,167	5,655	10,000	186,422
Highway Length:	97.0	131.3	6.7	21.0	48.9	11.8	32.0	32.0	2.1	382.8
LOS:	Α	В	С	Α	Α	В	В	В	С	A
LOS #:	1.0	2.3	3.4	1.9	1.7	2.4	2.3	2.1	3.0	
Weighted Average LOS:	0.3	0.8	0.1	0.1	0.2	0.1	0.2	0.2	0.0	1.9
Capacity:	4,000	4,906	2,400	2,069	2,503	2,315	2,808	2,429	2,400	25,830

Table 2
First Segment Growth Rates

	Average Ann	nual Daily Traffic		Percent	Port of Entry to which the
	2000	2020	Change	Change	Highway is Connected
Segment 1 of High	ways Directly	Connected to the	Land Ports of Ent	try	
Interstate 5	108,478	121,200	12,722	11.7%	San Ysidro
State Route 7	9,700	39,200	29,500	304.1%	Calexico East
State Route 11		40,500	40,500		East Otay Mesa
State Route 111	34,064	47,800	13,736	40.3%	Calexico
State Route 186	7,300	10,000	2,700	37.0%	Andrade
State Route 188	6,700	10,900	4,200	62.7%	Tecate
State Route 905	44,000	92,846	48,846	111.0%	Otay Mesa
Total:	210,242	362,446	152,204	72.4%	

**Notes:** The AATD shown above is the value for the first segment of each of the highways for calendar year 2000 and projections for 2020. The Change is the difference between the two numbers, and the percent change is calculated by dividing the difference by the AADT for calendar year 2000.

All of these highways are directly connected to the Land Ports of Entry, and the US-Mexico border.

The total growth rate of 72.4% is the growth rate that is used to calculate the 2020 border crossings of passenger vehicles and buses.

### THE SAN DIEGO / TIJUANA / TECATE CORRIDOR: CALENDAR YEAR 2000 DATA

Table 3a Interstate 5 Data 2000

Wi	thin 100 kr	n of the US-N	lexico Borde	er?	Υ			
Sei	ves an Inte	ernational PO	E?		Υ			
Seg-	Begin	End	Length	Avg Ann	Level of	Service	<b>.</b>	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to	1 to		Traffic Capacity
1	0.000	0.900	0.900	108,478	С	3		8,000
2	0.900	3.100	2.200	69,471	Α	1		8,000
3	3.100	4.700	1.600	112,097	С	3		8,600
4	4.700	6.800	2.100	156,412	D	4		8,600
5	6.800	9.400	2.600	161,771	D	4		8,800
6	9.400	12.600	3.200	200,479	F0	6		8,000
7	12.600	14.100	1.500	166,405	F0	6		8,000
8	14.100	15.000	0.900	190,400	F0	6		8,000
9	15.000	16.100	1.100	212,017	F0	6		9,200
10	16.100	17.500	1.400	198,916	F0	6		8,600
11	17.500	20.100	2.600	191,334	E	5		8,600
12	20.100	23.500	3.400	216,115	F0	6		8,600
13	23.500	26.000	2.500	202,870	F0	6		8,600
14	26.000	30.700	4.700	164,418	E	5		8,000
15	30.700	32.900	2.200	256,962	F1	7		8,600
16	32.900	38.600	5.700	225,711	F0	6		8,600
17	38.600	42.700	4.100	200,400	F0	6		8,000
18	42.700	47.000	4.300	192,939	F0	6		8,000
19	47.000	51.200	4.200	199,142	F0	6		8,000
20	51.200	53.200	2.000	186,098	E	5		8,000
21	53.200	53.900	0.700	179,300	E	5		8,600
22	53.900	56.400	2.500	145,000	С	3		10,000
23	56.400	72.400	16.000	124,428	С	3		8,000
Sum			72.400	4,061,163		114		193,400
Estimating	the Weigh	nted Average:	s for I-5					
Segment	Weight	AADT		Level of Serv	/ice		Capa	city
1	1.2%	1,348			0.037		99	
2	3.0%	2,111			0.030		243	
3	2.2%	2,477			0.066		190	
4	2.9%	4,537			0.116		249	
5	3.6%	5,809			0.144		316	
6	4.4%	8,861			0.265		354	
Segment	Weight	AADT		Level of Serv			Capa	city
7	2.1%	3,448			0.124		166	<u>-</u>
8	1.2%	2,367			0.075		99	
9	1.5%	3,221			0.091		140	

	100.0%	172,043	D	4.740	8,300
11	3.6%	6,871		0.180	309
10	1.9%	3,846		0.116	166

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 3b Interstate 8 Data 2000

Within	100 km of	the US-Mex	ico Border?		γ		
Serves	an Internat	ional POE?			Υ		
Seg-	Begin	End	Length	Avg Ann	Level of	Service	
ment	Post	Post	Miles	Daily	A to	1 to	Traffic
#	Mile	Mile		Traffic	F3	9	Capacity
1	Overlann	ina Saamant	s 1 & 2 dropped				
2	Overlapp		3 T & Z Gropped				
3	0.000	2.400	2.400	219,379	F0	6	8,600
4	2.400	4.400	2.000	229,606	F0	6	8,600
5	4.400	5.600	1.200	279,300	F1	7	9,200
6	5.600	9.600	4.000	251,170	F0	6	10,000
7	9.600	12.400	2.800	195,790	F0	6	8,600
8	12.400	15.800	3.400	209,110	F0	6	8,600
9	15.800	18.700	2.900	110,307	F0	6	5,200
10	18.700	25.700	7.000	65,920	D	4	4,000
11	25.700	28.500	2.800	55,400	D	4	4,600
12	28.500	31.300	2.800	34,600	В	2	4,600
13	31.300	34.300	3.000	22,800	Α	1	4,600
14	34.300	37.800	3.500	22,800	Α	1	4,600
15	37.800	65.900	28.100	14,186	Α	1	4,000
16	65.900	77.800	11.900	11,609	Α	1	4,000
17							
18							
19							
20							
Sum			77.800	1,721,977		57	89,200
Estimating the	Weighted	Averages fo	or I-8				
Segment	Weight	AADT		Level of Se	ervice		Capacity
1							
2	Overlapp	ing Segment	s 1 & 2 dropped				
3	3.1%	6,767			0.185		265
4	2.6%	5,902			0.154		221
5	1.5%	4,308			0.108		142
6	5.1%	12,914			0.308		514
7	3.6%	7,046			0.216		310
8	4.4%	9,138			0.262		376
9	3.7%	4,112			0.224		194

10	9.0%	5,931		0.360	360
11	3.6%	1,994		0.144	166
12	3.6%	1,245		0.072	166
13	3.9%	879		0.039	177
14	4.5%	1,026		0.045	207
15	36.1%	5,124		0.361	1,445
16	15.3%	1,776		0.153	612
Segment	Weight	AADT	Level o	f Service	Capacity
17					
18					
19					
20					
Sum	100.0%	68,163	В	2.631	5,153
Notes	LOS coding:	A = 1, B = 2, C = 3, D = 4, E	= 5, F0 = 6, F1 = 7	7, F2 = 8, F3 = 9	
Source:	California BIN	IS Technical Committee repr	esentative		

Table 3c State Route 11 Data 2000

Wi	thin 100 kr	n of the l	JS-Mexico Bord	er?	Υ		
Se	rves an Inte	ernationa	I POE?		Υ		
Seg-	Begin	End	Length	Avg Ann	Level o	f Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Estimating	the Weigh	nted Aver	ages for SR 11				
Segment	Weight	AADT		Level of Se	ervice	(	Capacity
n/a	n/a	n/a		n/a	n/a	r	n/a
Notes	LOS c	oding: A =	1, B = 2, C = 3, D =	4, E = 5, F0 = 6, F1	= 7, F2 = 8, F	3 = 9	
Source:	Califor	nia BINS Ted	hnical Committee	representative			

Table 3d Interstate 15 Data 2000

Wi	thin 100 kı	m of the US-	Mexico Borde	er?	Υ			
Se	rves an Int	ernational P	OE?		Υ			
Segment	Begin	End Post	Length	Avg Ann	Level of S	Service		Peak Hr Traffic
#	Post Mile	Mile	Miles	Daily Traffic	A to F3	1 to	9	Capacity
1	0.000	2.200	2.200	103,265	F0	6	6	5,000
2	2.200	3.400	1.200	107,600	С	3	6	5,600
3	3.400	5.600	2.200	69,715	F	5	2	2,000
4	5.600	6.100	0.500	89,000	D	4	e	5,000
5	6.100	9.300	3.200	191,116	F0	6	ç	9,200
6	9.300	10.600	1.300	154,175	E	5	8	3,000
7	10.600	12.100	1.500	154,700	Е	5	8	3,000
8	12.100	15.900	3.800	286,012	F0	6	1	10,000
9	15.900	18.200	2.300	258,147	F2	8	ç	9,200
10	18.200	19.400	1.200	218,300	F1	7	8	3,000
11	19.400	26.000	6.600	213,991	F0	6	8	3,600
12	26.000	27.600	1.600	215,940	F1	7	8	3,600
13	27.600	31.500	3.900	176,879	D	4	Ç	9,200
14	31.500	36.600	5.100	93,610	В	2	8	3,000
15	36.600	46.500	9.900	88,737	D	4	8	3,000
16	46.500	54.300	7.800	91,020	С	3	8	3,000
Sum			54.300	2,512,207		81		123,400
Estimating	the Weigl	nted Averag	es for I-15					
Segment	Weight	AADT		Level of Se	ervice		Capa	city
		4,184			0.243		243	
1	4.1%							
2	4.1% 2.2%	2,378			0.066		146	
	+				0.066		146 81	
2	2.2%	2,378						
2	2.2% 4.1%	2,378 2,825			0.203		81	
2 3 4	2.2% 4.1% 0.9%	2,378 2,825 820			0.203 0.037		81 55	
2 3 4 5	2.2% 4.1% 0.9% 5.9%	2,378 2,825 820 11,263			0.203 0.037 0.354		81 55 542	
2 3 4 5 6 7	2.2% 4.1% 0.9% 5.9% 2.4%	2,378 2,825 820 11,263 3,691			0.203 0.037 0.354 0.120		81 55 542 192	
2 3 4 5 6	2.2% 4.1% 0.9% 5.9% 2.4% 2.8%	2,378 2,825 820 11,263 3,691 4,273 20,016			0.203 0.037 0.354 0.120 0.138		81 55 542 192 221 700	
2 3 4 5 6 7 8 9	2.2% 4.1% 0.9% 5.9% 2.4% 2.8% 7.0%	2,378 2,825 820 11,263 3,691 4,273			0.203 0.037 0.354 0.120 0.138 0.420		81 55 542 192 221	
2 3 4 5 6 7 8	2.2% 4.1% 0.9% 5.9% 2.4% 2.8% 7.0% 4.2%	2,378 2,825 820 11,263 3,691 4,273 20,016 10,934			0.203 0.037 0.354 0.120 0.138 0.420 0.339		81 55 542 192 221 700 390	<u> </u>
2 3 4 5 6 7 8 9 10	2.2% 4.1% 0.9% 5.9% 2.4% 2.8% 7.0% 4.2% 2.2%	2,378 2,825 820 11,263 3,691 4,273 20,016 10,934 4,824			0.203 0.037 0.354 0.120 0.138 0.420 0.339 0.155		81 55 542 192 221 700 390 177	
2 3 4 5 6 7 8 9 10 11	2.2% 4.1% 0.9% 5.9% 2.4% 2.8% 7.0% 4.2% 2.2% 12.2%	2,378 2,825 820 11,263 3,691 4,273 20,016 10,934 4,824 26,010			0.203 0.037 0.354 0.120 0.138 0.420 0.339 0.155 0.729		81 55 542 192 221 700 390 177 1,045	5
2 3 4 5 6 7 8 9 10 11 12	2.2% 4.1% 0.9% 5.9% 2.4% 2.8% 7.0% 4.2% 2.2% 12.2% 2.9%	2,378 2,825 820 11,263 3,691 4,273 20,016 10,934 4,824 26,010 6,363			0.203 0.037 0.354 0.120 0.138 0.420 0.339 0.155 0.729 0.206		81 55 542 192 221 700 390 177 1,045 253	;
2 3 4 5 6 7 8 9	2.2% 4.1% 0.9% 5.9% 2.4% 2.8% 7.0% 4.2% 2.2% 12.2% 2.9% 7.2%	2,378 2,825 820 11,263 3,691 4,273 20,016 10,934 4,824 26,010 6,363 12,704			0.203 0.037 0.354 0.120 0.138 0.420 0.339 0.155 0.729 0.206 0.287		81 55 542 192 221 700 390 177 1,045 253 661	
2 3 4 5 6 7 8 9 10 11 12 13	2.2% 4.1% 0.9% 5.9% 2.4% 2.8% 7.0% 4.2% 2.2% 12.2% 2.9% 7.2% 9.4%	2,378 2,825 820 11,263 3,691 4,273 20,016 10,934 4,824 26,010 6,363 12,704 8,792			0.203 0.037 0.354 0.120 0.138 0.420 0.339 0.155 0.729 0.206 0.287 0.188		81 55 542 192 221 700 390 177 1,045 253 661 751	)

Table 3e State Route 94 Data 2000

	rves an Inte		S-Mexico Bord	C	Y		
Seg-	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to	1 to	Traffic Capacity
1	1.400	3.200	1.800	128,573	E	5	8,400
2	3.200	4.100	0.900	156,406	E	5	9,660
3	4.100	6.200	2.100	181,005	E	5	10,500
4	6.200	9.800	3.600	167,400	F0	6	8,400
5	9.800	10.100	0.300	156,800	E	5	8,400
6	10.100	13.300	3.200	70,735	D	4	4,000
7	13.300	14.300	1.000	41,000	D	4	2,800
8	14.300	14.900	0.600	49,600	F0	6	2,800
9	14.900	19.800	4.900	20,600	E	5	2,000
10	19.800	24.800	5.000	10,713	В	2	2,000
11	24.800	39.000	14.200	6,200	В	2	2,000
Sum			37.600	989,032		49	60,960
Estimating	the Weigh	nted Avera	ges for SR 94				
Segment	Weight	AADT		Level of Se	ervice		Capacity
1	4.8%	6,155			0.239		402
2	2.4%	3,744			0.120		231
3	5.6%	10,109			0.279		586
4	9.6%	16,028			0.574		804
5	0.8%	1,251			0.040		67
6	8.5%	6,020			0.340		340
7	2.7%	1,090			0.106		74
8	1.6%	791			0.096		45
9	13.0%	2,685			0.652		261
10	13.3%	1,425			0.266		266
11	37.8%	2,341			0.755		755
Sum	100.0%	51,639		С	3.468		3,833

Table 3f State Route 125 Data 2000

Wi	thin 100 kr	n of the US	S-Mexico Bord	ler?	Υ		
Sei	rves an Inte	ernational	POE?		Υ		
Seg-	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1	0.000	9.600	9.600				
2	9.600	11.200	1.600				
3	11.200	14.600	3.400	27,531	D	4	2,000
4	14.600	15.500	0.900	121,400	D	4	6,000
5	15.500	22.400	6.900	37,100	Е	5	2,400
Sum			11.200	186,031		13	10,400
Estimating	the Weigh	nted Avera	ges for SR 12	5			
Segment	Weight	AADT		Level of Se	ervice	(	Capacity
1							
2							
3	30.4%	8,358			1.214		507
4	8.0%	9,755			0.321		482
5	61.6%	22,856			3.080		1,479
Sum	100.0%	40,969		D	4.616	:	2,568
Notes	LOS c	oding: A = 1	, B = 2, C = 3, D =	= 4, E = 5, F0 = 6, F1	= 7, F2 = 8, F3	3 = 9	
Source:	Califor	nia BINS Tech	nical Committee	representative			

Table 3g State Route 188 Data 2000

Wi	thin 100 kr	n of the US-	Mexico Bord	er?	Υ		
Se	rves an Inte	ernational P	OE?		Υ		
Segment	Begin	End Post	Length	Avg Ann	Level of S	Service	Peak Hr Traffic
#	Post Mile	Mile	Miles	Daily Traffic	A to F3	1 to 9	Capacity
1	0.000	0.100	0.100	6,700	В	2	2,000
2	0.100	0.600	0.500	6,700	В	2	2,000
2	0.600	1.900	1.300	6,700	В	2	2,000
3	0.600	1.700					
Sum	0.600	1.700	1.900	20,100		6	6,000
Sum				,		6	6,000
Sum			1.900	,	ervice	·	6,000 apacity
Sum Estimating	g the Weigh	nted Averag	1.900	3	<b>ervice</b> 0.105	C	, , , , , , , , , , , , , , , , , , ,
Sum Estimating Segment	g the Weigh	nted Averag	1.900	3		C:	apacity
Sum Estimating Segment	the Weight 5.3%	AADT 353	1.900	3	0.105	C: 10	apacity 05
Sum Estimating Segment 1 2	y the Weight 5.3% 26.3%	AADT 353 1,763	1.900	3	0.105 0.526	C: 10 52	apacity 05 26

Table 3h Interstate 805 Data 2000

Wi	thin 100 kr	n of the us	S-Mexico Bord	er?	Υ		
Se	rves an Inte	ernational			Υ		
Segment	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr
#	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1	0.500	1.800	1.300	57,718	Α	1	8,000
2	1.800	2.900	1.100	99,100	В	2	8,000
3	2.900	7.200	4.300	155,942	С	3	8,600
4	7.200	8.900	1.700	210,696	F0	6	8,600
5	8.900	13.500	4.600	228,602	F0	6	10,000
6	13.500	14.600	1.100	233,181	F1	7	8,400
7	14.600	17.600	3.000	230,634	F0	6	10,000
8	17.600	20.600	3.000	217,935	F0	6	10,000
9	20.600	23.700	3.100	182,105	D	4	8,600
10	23.700	27.100	3.400	183,341	F0	6	8,600
		00 500	1.400	130,500	В	2	8,000
11	27.100	28.500	1.400	100/000	_		
11 <b>Sum</b>	27.100	28.500	28.000	1,929,754		49	96,800
Sum	•	1					
Sum	•	1	28.000				
Sum Estimating	g the Weigh	nted Avera	28.000	1,929,754			96,800
Sum Estimating Segment	the Weight	nted Avera	28.000	1,929,754	vice		96,800 Capacity
Sum Estimating Segment	the Weight 4.6%	AADT 2,680	28.000	1,929,754	<b>vice</b> 0.046		96,800 Capacity 371
Sum Estimating Segment 1 2	y the Weight 4.6% 3.9%	AADT 2,680 3,893	28.000	1,929,754	vice 0.046 0.079		96,800  Capacity 371 314
Sum Estimating Segment 1 2 3	weight 4.6% 3.9% 15.4%	AADT 2,680 3,893 23,948	28.000	1,929,754	vice 0.046 0.079 0.461		96,800  Capacity 371 314 1,321
Sum Estimating Segment 1 2 3 4	y the Weight 4.6% 3.9% 15.4% 6.1%	AADT 2,680 3,893 23,948 12,792	28.000	1,929,754	0.046 0.079 0.461 0.364		96,800  Capacity 371 314 1,321 522
Sum Estimating Segment 1 2 3 4 5	y the Weight 4.6% 3.9% 15.4% 6.1% 16.4%	AADT 2,680 3,893 23,948 12,792 37,556	28.000	1,929,754	0.046 0.079 0.461 0.364 0.986		96,800  Capacity 371 314 1,321 522 1,643
Sum Estimating Segment 1 2 3 4 5 6	weight 4.6% 3.9% 15.4% 6.1% 16.4% 3.9%	AADT 2,680 3,893 23,948 12,792 37,556 9,161	28.000	1,929,754	0.046 0.079 0.461 0.364 0.986 0.275		96,800  Capacity  371  314  1,321  522  1,643  330
Sum Estimating Segment 1 2 3 4 5 6 7	3 the Weight 4.6% 3.9% 15.4% 6.1% 16.4% 3.9% 10.7%	AADT 2,680 3,893 23,948 12,792 37,556 9,161 24,711	28.000	1,929,754	0.046 0.079 0.461 0.364 0.986 0.275 0.643		96,800  Capacity 371 314 1,321 522 1,643 330 1,071
Sum Estimating Segment 1 2 3 4 5 6 7	3 the Weight 4.6% 3.9% 15.4% 6.1% 16.4% 3.9% 10.7%	AADT 2,680 3,893 23,948 12,792 37,556 9,161 24,711 23,350	28.000	1,929,754	0.046 0.079 0.461 0.364 0.986 0.275 0.643		P6,800  Capacity  371  314  1,321  522  1,643  330  1,071  1,071
Sum Estimating Segment 1 2 3 4 5 6 7 8 9	y the Weight 4.6% 3.9% 15.4% 6.1% 16.4% 3.9% 10.7% 10.7% 11.1%	AADT 2,680 3,893 23,948 12,792 37,556 9,161 24,711 23,350 20,162	28.000	1,929,754	0.046 0.079 0.461 0.364 0.986 0.275 0.643 0.443		96,800  Capacity  371 314 1,321 522 1,643 330 1,071 1,071 952

Table 3i Interstate 905 Data 2000

			S-Mexico Bord	er?	Y			
Segment	rves an Inte Begin	End End	Length	Avg Ann	Y Level of S	Service	Peak Hr	
#	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity	
1	2.800	5.200	2.400	44,000	В	2	4,000	
2	5.200	6.600	1.400	51,000	С	3	4,000	
3	6.600	7.600	1.000	60,400	D	4	2,400	
4	7.600	8.700	1.100	54,700	D	4	2,400	
5	8.700	9.700	1.000	39,600	D	4	2,400	
6	9.700	10.600	0.900	39,600	В	2	4,000	
7	10.600	12.000	1.400	30,000	С	3	2,400	
Sum			9.200	319,300		22	21,600	
Estimating	the Weigh	nted Avera	ges for I-905					
Segment	Weight	AADT		Level of Se	ervice		Capacity	
1	26.1%	11,478			0.522		1,043	
2	15.2%	7,761			0.457		609	
3	10.9%	6,565			0.435		261	
4	12.0%	6,540			0.478		287	
5	10.9%	4,304			0.435		261	
6	9.8%	3,874			0.196		391	
7	15.2%	4,565			0.457		365	
Sum	100.0%	45,088		В	2.978	İ	3,217	

### THE SAN DIEGO / TIJUANA / TECATE CORRIDOR: CALENDAR YEAR 2020 DATA

Table 4a Interstate 5 Data 2020

Wi	thin 100 kr	n of the US-IV	lexico Borde	er?	Υ			
Sei	ves an Inte	ernational PO	E?		Υ			
Seg-	Begin	End	Length	Avg Ann	Level of S	ervice		Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to		Traffic Capacity
1	0.000	0.900	0.900	121,200	E	5		8,000
2	0.900	3.100	2.200	81,813	В	2		8,000
3	3.100	4.700	1.600	153,573	F0	6		8,000
4	4.700	6.800	2.100	200,798	F3	9		8,000
5	6.800	9.400	2.600	215,590	F3	9		8,000
6	9.400	12.600	3.200	228,299	F1	7		10,000
7	12.600	14.100	1.500	207,853	F2	8		8,600
8	14.100	15.000	0.900	214,459	F0	6		8,600
9	15.000	16.100	1.100	264,900	F0	6		10,600
10	16.100	17.500	1.400	253,747	F3	9		8,600
11	17.500	20.100	2.600	208,997	F0	6		8,600
12	20.100	23.500	3.400	257,778	F0	6		8,600
13	23.500	26.000	2.500	229,146	F0	6		8,000
14	26.000	30.700	4.700	213,745	F1	7		8,000
15	30.700	32.900	2.200	415,500	F0	6		12,800
16	32.900	38.600	5.700	317,804	F2	8		10,000
17	38.600	42.700	4.100	266,509	F0	6		10,000
18	42.700	47.000	4.300	249,913	F0	6		10,000
19	47.000	51.200	4.200	243,048	F0	6		10,000
20	51.200	53.200	2.000	248,721	F2	8		8,000
21	53.200	53.900	0.700	209,100	F1	7		8,000
22	53.900	56.400	2.500	200,224	F1	7		8,000
23	56.400	72.400	16.000	200,000	F1	7		8,000
Sum			72.400	5,202,717		153		204,400
Estimating	the Weigh	nted Average	s for I-5					
Segment	Weight	AADT		Level of Servi	ce		Capa	acity
1	1.2%	1,507			0.062		99	<u>-</u>
2	3.0%	2,486			0.061		243	
3	2.2%	3,394			0.133		177	
4	2.9%	5,824			0.261		232	
5	3.6%	7,742			0.323		287	
6	4.4%	10,091			0.309		442	
Segment	Weight	AADT		Level of Servi	•			acity
7	2.1%	4,306			0.166		178	<u>-</u>
8	1.2%	2,666			0.075		107	

	100.0%	230,033	F0	6.747	8,860
23	22.1%	44,199		1.547	1,768
22	3.5%	6,914		0.242	276
21	1.0%	2,022		0.068	77
20	2.8%	6,871		0.221	221
19	5.8%	14,099		0.348	580
18	5.9%	14,843		0.356	594
17	5.7%	15,092		0.340	566
16	7.9%	25,020		0.630	787
15	3.0%	12,626		0.182	389
14	6.5%	13,876		0.454	519
13	3.5%	7,913		0.207	276
12	4.7%	12,106		0.282	404
11	3.6%	7,505		0.215	309
10	1.9%	4,907		0.174	166
9	1.5%	4,025		0.091	161

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 4b Interstate 8 Data 2020

Within 1	00 km of t	he US-Mexi	co Border?		Υ			
Serves a	n Internati	ional POE?			Υ			
Seg-	Begin	End	Length	Avg Ann	Level of S	ervice		Peak Hr
ment	Post	Post	Miles	Daily	A to	1 to		Traffic
#	Mile	Mile		Traffic	F3	9		Capacity
1	Overlappi	ng Segments	1 & 2 dropped					
2	0.000	2.400	2.400	220 E10	F0			10,600
3	0.000		2.400	228,510		6		*
4	2.400	4.400		234,105	F1	7		9,200
5	4.400	5.600	1.200	271,800	F2	8		9,200
6	5.600	9.600	4.000	259,671	F2	1		10,000
7	9.600	12.400	2.800	198,128	F1	7		8,000
8	12.400	15.800	3.400	192,545	F0	6		8,600
9	15.800	18.700	2.900	108,452	D	4		8,000
10	18.700	25.700	7.000	59,976	С	3		6,000
11	25.700	28.500	2.800	49,800	С	3		6,000
12	28.500	31.300	2.800	31,500	В	2		6,000
13	31.300	34.300	3.000	31,400	A	1		4,600
14	34.300	37.800	3.500	31,400	A	1		4,600
15	37.800	65.900	28.100	19,179	Α	1		4,000
16	65.900	77.800	11.900	17,572	Α	1		4,000
17								
18								
19								
20								
Sum			77.800	1,734,038		58		98,800
Estimating the	Weighted /	Averages fo	r I-8					
Segment	Weight	AADT		Level of Se	rvice		Cap	pacity
1								
2	Overlappi	ng Segments	1 & 2 dropped					
3	3.1%	7,049			0.185		327	1
4	2.6%	6,018			0.180		237	1
5	1.5%	4,192			0.123		142	
6	5.1%	13,351			0.411		514	ļ
7	3.6%	7,131			0.252		288	3
8	4.4%	8,415			0.262		376	Ď
9	3.7%	4,043			0.149		298	3
10	9.0%	5,396			0.270		540	)
11	3.6%	1,792			0.108		216	•
12	3.6%	1,134			0.072		216	<u></u>
13	3.9%	1,211			0.039		177	1
14	4.5%	1,413			0.045		207	1
15	36.1%	6,927			0.361		1,4	45

16	15.3%	2,688		0.153	612
Segment	Weight	AADT	Level of	Service	Capacity
17					
18					
19					
20					
Sum	100.0%	70,758	В	2.611	5,594
Notes	LOS coding:	A = 1, B = 2, C = 3, D = 4	4, E = 5, F0 = 6, F1 = 7,	F2 = 8, F3 = 9	

Table 4c State Route 11 Data 2020

Wi	ithin 100 kr	m of the US	S-Mexico Bord	er?	Υ		
Se	rves an Inte	ernational	POE?		Υ		
Seg- Begin		Begin End Lei	Length	Avg Ann	Level of	Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1	0.000	2.700	2.700	40,500	В	2	4,400
Sum			2.700	40,500	В	2	4,400
Estimating	g the Weigh	nted Avera	ges for SR 11				
Segment	Weight	AADT		Level of Se	ervice		Capacity
1	100.0%	40,500			2.000		4,400
Sum	100.0%	40,500		В	2.000		4,400
Notes	LOS c	oding: A = 1	, B = 2, C = 3, D =	4, E = 5, F0 = 6, F1	= 7, F2 = 8, F3	3 = 9	
Source:	Califor	nia BINS Tech	nical Committee	representative			

Table 4d Interstate 15 Data 2020

Wit	thin 100 kr	n of the US	-Mexico Bord	er?	Υ			
Ser	ves an Int	ernational I	POE?		Υ			
Seg-	Begin	End	Length	Avg Ann	Level of	Service		Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to		Traffic Capacity
1	0.000	2.200	2.200	115,000	С	3		9,378
2	2.200	3.400	1.200	111,000	D	4		7,920
3	3.400	5.600	2.200	133,000	С	3		8,800
4	5.600	6.100	0.500	131,000	С	3		9,200
5	6.100	9.300	3.200	200,000	С	3		10,520
6	9.300	10.600	1.300	150,000	В	2		10,520
7	10.600	12.100	1.500	153,000	В	2		10,520
8	12.100	15.900	3.800	281,000	С	3		16,373
9	15.900	18.200	2.300	272,000	С	3		15,120
10	18.200	19.400	1.200	214,000	С	3		12,820
11	19.400	26.000	6.600	215,000	С	3		13,469
12	26.000	27.600	1.600	240,000	С	3		12,820
13	27.600	31.500	3.900	203,000	С	3		11,899
14	31.500	36.600	5.100	145,000	С	3		9,200
15	36.600	46.500	9.900	149,000	D	4		9,200
16	46.500	54.300	7.800	149,000	D	4		9,200
Sum	I	· I	54.300	2,861,000		49		176,959
Estimating	the Weigl	nted Averag	ges for I-15		•	•		-
Segment	Weight	AADT		Level of Se	ervice		Capa	acity
1	4.1%	4,659			0.122		380	
2	2.2%	2,453			0.088		175	
3	4.1%	5,389			0.122		357	
4	0.9%	1,206			0.028		85	
5	5.9%	11,786			0.177		620	
6	2.4%	3,591			0.048		252	
7	2.8%	4,227			0.055		291	
8	7.0%	19,665			0.210		1,14	6
9	4.2%	11,521			0.127		640	
10	2.2%	4,729			0.066		283	
11	12.2%	26,133			0.365		1,63	7
12	2.9%	7,072			0.088		378	
13	7.2%	14,580			0.215		855	
14	9.4%	13,619			0.282		864	
15	18.2%	27,166			0.729		1,67	7
16	14.4%	21,403			0.575		1,32	2
Sum	100.0%	179,199		С	3.297		10,9	
Notes			B = 2, C = 3, D =	4, E = 5, F0 = 6, F1 =		3 = 9		
Source:	Califor	nia BINS Techi	nical Committee	representative				

Table 4e State Route 94 Data 2020

Se	rves an Inte	ernational	POE?		Υ		
Segment	Begin		Length	Avg Ann	Level of S	Service	Peak Hr
	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1	1.400	3.200	1.800	155,386	В	2	10,380
2	3.200	4.100	0.900	164,297	С	3	10,380
3	4.100	6.200	2.100	196,859	D	4	10,500
4	6.200	9.800	3.600	184,987	Е	5	8,400
5	9.800	10.100	0.300	235,900	D	4	13,380
6	10.100	13.300	3.200	103,378	С	3	6,600
7	13.300	14.300	1.000	56,400	С	3	4,400
8	14.300	14.900	0.600	44,300	В	2	4,400
9	14.900	19.800	4.900	29,773	С	3	5,100
10	19.800	24.800	5.000	10,699	В	2	4,411
11	24.800	39.000	14.200	9,000	D	4	1,550
Sum			37.600	1,190,979		35	79,501
Estimating	the Weigh	nted Avera	ges for SR 94				
Segment	Weight	AADT		Level of Se	ervice		Capacity
1	4.8%	7,439			0.096		497
2	2.4%	3,933			0.072 24		248
3	5.6%	10,995			0.223 58		586
4	9.6%	17,712			0.479		804
5	0.8%	1,882			0.032		107
6	8.5%	8,798			0.255		562
7	2.7%	1,500			0.080		117
8	1.6%	707			0.032		70
9	13.0%	3,880			0.391		665
10	13.3%	1,423			0.266		587
11	37.8%	3,399			1.511		585
	100.0%	61,667		С	3.436		4,828

Table 4f State Route 125 Data 2020

Wi	thin 100 kr	n of the US	S-Mexico Bord	er?	Υ		
Sei	rves an Inte	ernational	POE?		Υ		
Seg-	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1	0.000	9.600	9.600	65,350	В	2	8,000
2	9.600	11.200	1.600	95,000	С	3	8,000
3	11.200	14.600	3.400	179,220	F3	9	6,000
4	14.600	15.500	0.900	206,082	F2	8	8,000
5	15.500	22.400	6.900	95,942	D	4	6,000
Sum			22.400	641,594		26	36,000
Estimating	the Weigl	nted Avera	ges for SR 12!	5			
Segment	Weight	AADT		Level of Se	ervice	(	Capacity
1	42.9%	28,007			0.857	3	3,429
2	7.1%	6,786			0.214	5	571
3	15.2%	27,203			1.366	ç	711
4	4.0%	8,280			0.321	3	321
5	30.8%	29,554			1.232	1	,848
Sum	100.0%	99,830		С	3.991	7	7,080
Notes	LOS c	oding: A = 1	, B = 2, C = 3, D =	: 4, E = 5, F0 = 6, F1	= 7, F2 = 8, F3	3 = 9	
Source:	Califor	nia BINS Tech	nical Committee	representative			

Table 4g State Route 188 Data 2020

Wi	ithin 100 kr	n of the U	S-Mexico Bord	er?	Υ		
Se	rves an Inte	ernational	POE?		Υ		
Seg-	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1	0.000	0.100	0.100	10,900	В	2	2,400
2	0.100	0.600	0.500	10,900	В	2	2,400
3	0.600	1.900	1.300	21,000	С	3	2,400
Sum			1.900	42,800		7	7,200
Estimating	the Weigh	nted Avera	ges for SR 188	3			
Segment	Weight	AADT		Level of Se	ervice	С	apacity
1	5.3%	574			0.105	1	26
2	26.3%	2,868			0.526	6	32
3	68.4%	14,368			2.053	1	,642
Sum	100.0%	17,811		В	2.684	2	2,400
Notes	LOS c	oding: A = 1	1, B = 2, C = 3, D =	4, E = 5, F0 = 6, F1	= 7, F2 = 8, F3	3 = 9	
		-					
Source:	Califor	nia BINS Tecl	nnical Committee	representative			

Table 4h Interstate 805 Data 2020

Wi	thin 100 kr	n of the US	Mexico Bord	er?	Y		
	rves an Inte				Υ		
Seg-	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1	0.500	1.800	1.300	78,136	С	3	8,000
2	1.800	2.900	1.100	149,400	С	3	10,560
3	2.900	7.200	4.300	237,876	E	5	10,292
4	7.200	8.900	1.700	263,608	F2	8	8,600
5	8.900	13.500	4.600	238,907	F0	6	10,000
6	13.500	14.600	1.100	256,200	F2	8	8,600
7	14.600	17.600	3.000	240,345	F1	7	9,200
8	17.600	20.600	3.000	242,513	F0	6	10,000
9	20.600	23.700	3.100	230,171	F0	6	8,600
10	23.700	27.100	3.400	261,375	F0	6	9,200
11	27.100	28.500	1.400	220,800	F1	7	8,000
Sum			28.000	2,419,331		65	101,052
Estimating	the Weigh	nted Avera	ges for I-805				
Segment	Weight	AADT		Level of S	ervice		Capacity
1	4.6%	3,628			0.139		371
2	3.9%	5,869			0.118		415
3	15.4%	36,531			0.768		1,581
4	6.1%	16,005			0.486		522
5	16.4%	39,249			0.986		1,643
6	3.9%	10,065			0.314		338
7	10.7%	25,751			0.750		986
8	10.7%	25,984			0.643		1,071
9	11.1%	25,483			0.664		952
10	12.1%	31,738			0.729		1,117
11	5.0%	11,040			0.350		400
	100.0%	231,343		E	5.946		9,396

Table 4i Interstate 905 Data 2020

Se	rves an Inte	ernational	POE?		Υ		
Seg- ment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	Level of A to F3	Service 1 to 9	Peak Hr Traffic Capacity
1	2.800	5.200	2.400	92,846	D	4	5,720
2	5.200	6.600	1.400	91,400	С	3	6,600
3	6.600	7.600	1.000	94,600	С	3	6,600
4	7.600	8.700	1.100	87,400	С	3	6,600
5	8.700	9.700	1.000	72,800	В	2	6,600
6	9.700	10.600	0.900	49,700	В	2	6,600
7	10.600	12.000	1.400	36,900	Α	1	6,600
Sum			9.200	525,646		18	45,320
Estimating	g the Weigl	nted Avera	ges for I-905				
Segment	Weight	AADT		Level of S	ervice		Capacity
1	26.1%	24,221			1.043		1,492
2	15.2%	13,909			0.457		1,004
3	10.9%	10,283			0.326		717
4	12.0%	10,450			0.359		789
5	10.9%	7,913			0.217		717
6	9.8%	4,862			0.196		646
7	15.2%	5,615			0.152		1,004
Sum	100.0%	77,252		В	2.750		6,370

# IMPERIAL / MEXICALI CORRIDOR: CALENDAR YEAR 2000 DATA

# Table 5a Interstate 8 Data 2000

Wi	thin 100 kr	n of the US	Mexico Bord	er?	Υ		
Sei	rves an Inte	ernational F	POE?		Υ		
Seg-	Begin	End	Length	Avg Ann	Level of	f Service	
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to	Traffic Capacity
1							
2							
3							
4							
5							
6							
7							
8							
9							
10							
11							
12							
13							
14							
15							
16							
17	0.000	37.000	37.000	11,720	Α	1	4,000
18	37.000	40.900	3.900	28,117	Α	1	4,000
19	40.900	65.800	24.900	9,498	Α	1	4,000
20	65.800	97.000	31.200	12,523	Α	1	4,000
Sum	•	•	97.000	61,858		4	16,000
Estimating	the Weigh	nted Averag	es for I-8	•	•	•	
Segment	Weight	AADT	,	Level of Serv	ice		Capacity
1							
2							
3							
4							
5							
6							
7							
Segment	Weight	AADT		Level of Serv	ice		Capacity
8							
9							
10							
11							

12					
13					
14					
15					
16					
17	38.1%	4,471		0.381	1,526
18	4.0%	1,130		0.040	161
19	25.7%	2,438		0.257	1,027
20	32.2%	4,028		0.322	1,287
Sum	100.0%	12,067	Α	1.000	4,000

Table 5b Interstate 10 Data 2000

Wi	thin 100 kr	m of the US-I	<b>Mexico Bord</b>	er?	Υ		
Se	rves an Inte	ernational Po	OE?		Υ		
Seg-	Begin	End	Length	Avg Ann	Level of	f Service	
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to	Traffic Capacity
1							
2							
3							
4							
5							
6							
7							
8							
9							
10	1						
11	25.2	29.7	4.500	60,000	Α	1	8,000
12	29.7	44.4	14.700	54,600	A	1	8,000
13	44.4	52.3	7.900	45,300	Α	1	6,000
14	52.3	57.6	5.300	29,300	А	1	6,000
15	57.600	105.100	47.500	15,200	Α	1	4,000
16	105.100	149.200	44.100	14,100	Α	1	4,000
17	149.200	154.200	5.000	16,200	Α	1	4,000
18	154.200	156.500	2.300	18,000	Α	1	4,000
Sum			131.300	252,700		8	44,000
	the Weigh	nted Average		, , , , , , , , , , , , , , , , , , , ,			
Segment	Weight	AADT		Level of Ser	vice		Capacity
1							
2							
3							
4							
5							
5 6							
5 6 7							
5 6 7 8							
5 6 7 8 9							
5 6 7 8 9	0.40						
5 6 7 8 9 10	3.4%	2,056			0.034		274
5 6 7 8 9 10 11	11.2%	6,113			0.112		896
5 6 7 8 9 10 11 12 13	11.2% 6.0%	6,113 2,726			0.112 0.060		896 361
5 6 7 8 9 10 11 12 13	11.2% 6.0% 4.0%	6,113 2,726 1,183			0.112 0.060 0.040		896 361 242
5 6 7 8 9 10 11 12 13 14 15	11.2% 6.0% 4.0% 36.2%	6,113 2,726 1,183 5,499			0.112 0.060 0.040 0.362		896 361 242 1,447
5 6 7 8 9 10 11 12 13	11.2% 6.0% 4.0% 36.2% 33.6%	6,113 2,726 1,183			0.112 0.060 0.040		896 361 242
5 6 7 8 9 10 11 12 13 14 15	11.2% 6.0% 4.0% 36.2%	6,113 2,726 1,183 5,499 4,736			0.112 0.060 0.040 0.362 0.336		896 361 242 1,447 1,343

Table 5c State Route 7 Data 2000

V	Within 100 km of the US-Mexico Border?					Υ				
Serves an International POE?					Υ					
Seg-	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr			
ment #	Post Mile	Post Mile	Miles Daily A to 1 to F3 9		1 to 9	Traffic Capacity				
1	0.000	1.200	1.200	9,700	В	2	2,400			
2	1.200	6.700	5.500							
Sum			1.200	9,700		2	2,400			

Segment	Weight	AADT	Level of Service		Capacity
1	100.0%	9,700		2.000	2,400
Sum	100.0%	9,700	В	2.000	2,400

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 5d State Route 78 Data 2000

Wi	thin 100 kı	m of the US-N	lexico Borde	er?	Υ			
Se	rves an Int	ernational PO	E?		Υ			
Seg-	Begin	End	Length	Avg Ann	Level of	f Service	9	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to		Traffic Capacity
1								
2								
3								
4								
5								
6								
7								
8								
9								
10								
11								
12								
13	0.000	13.200	13.200	700	В	2		2,000
14	13.200	13.800	0.600	19,064	В	2		2,000
15	13.800	15.000	1.200	14,747	В	2		2,400
16	15.000	18.700	3.700	3,400	В	2		2,000
17	18.700	21.000	2.300	3,100	В	2		2,000
Sum	•	•	21.000	41,011		10		10,400
Estimating	the Weigl	hted Average	s for SR 78					
Segment	Weight	AADT		Level of Sei	vice		Capa	city
1								
2								
3								
4								
5								
6								
7								
8								
9								
10								
11								
12								
13	62.9%	440			1.257		1,257	1
14	2.9%	545			0.057		57	
15	5.7%	843			0.114		137	
16	17.6%	599			0.352		352	
17	11.0%	340			0.219		219	

**Source:** California BINS Technical Committee representative

100.0% 2,766

Sum

2.000

2,023

Table 5e State Route 86 Data 2000

Wi	thin 100 kr	m of the US-	Mexico Bord	er?	Υ			
		ernational P			Υ			
Seg-	Begin	End	Length	Avg Ann	Level of	f Service		
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to	1 to	Traffic Capac	
1	Ī							
2								
3								
4								<u>-</u>
5								
6								<u>-</u>
7								
8	18.900	20.600	1.700	16,953	Α	1	2,800	
9	20.600	21.400	0.800	12,816	В	2	2,400	
10	21.400	43.600	22.200	9,978	В	2	2,000	
11	43.600	56.100	12.500	10,700	Α	1	2,800	
12	56.100	67.800	11.700	12,456	Α	1	2,800	
Sum			48.900	62,903		7	12,800	ງ
Estimating	the Weigl	nted Averag	es for SR 86					
Segment	Weight	AADT		Level of Ser	vice		Capacity	
1								
2								
3								
4								
5								
6								
7								
8	3.5%	589			0.035		97	
9	1.6%	210			0.033		39	
10	45.4%	4,530			0.908		908	
11	25.6%	2,735			0.256		716	
12	23.9%	2,980			0.239		670	
Sum	100.0%	11,044		Α	1.470		2,430	

Table 5f **State Route 98 Data 2000** 

١	Nithin 100 k	m of the US	Mexico Borde	r?	Υ		
Serves an International POE?							
Seg-	Begin	End	Length	Avg Ann	Level of	f Service	Peak Hr
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity
1							
2							
3	30.300	32.300	2.000	17,424	С	3	2,000
4	32.300	32.900	0.600	19,023	В	2	2,400
5	32.900	39.600	6.700	11,421	В	2	2,000
6	39.600	42.100	2.500	2,800	В	2	2,000
Sum			11.800	50,668		9	8,400

Segment	Weight	AADT	Level of Ser	vice	Capacity	
1						
2						
3	16.9%	2,953		0.508	339	
4	5.1%	967		0.102	122	
5	56.8%	6,485		1.136	1,136	
6	21.2%	593		0.424	424	
Sum	100.0%	10,999	В	2.169	2,020	

Table 5g State Route 111 Data 2000

Within 100 km of the US-Mexico Border? Serves an International POE?					Υ	Υ			
					Υ	Υ			
Seg-	Begin	End	Length	Avg Ann	Level o	f Service	Peak Hr		
ment #	Post Mile	Post Mile	Miles	les Daily Traffic		1 to 9	Traffic Capacity		
1	0.000	1.200	1.200	34,064	D	4	2,000		
2	1.200	4.700	3.500	29,700	Α	1	2,800		
3	4.700	7.700	3.000	29,356	В	2	2,800		
4	7.700	22.100	14.400	8,611	В	2	2,000		
5	22.100	22.600	0.500	9,940	В	2	2,000		
6	22.600	32.500	9.900	6,844	В	2	2,000		
Sum			32.500	118,515		13	13,600		

Segment	Weight	AADT	Level of Service		Capacity
1	3.7%	1,258		0.148	74
2	10.8%	3,198		0.108	302
3	9.2%	2,710		0.185	258
4	44.3%	3,815		0.886	886
5	1.5%	153		0.031	31
6	30.5%	2,085		0.609	609
Sum	100.0%	13,219	Α	1.966	2,160

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 5h State Route 115 Data 2000

V	Within 100 km of the US-Mexico Border?						Υ			
Serves an International POE?										
Seg-	Begin	End	Length	Avg Ann	Level of	f Service	Peak Hr			
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity			
1	3.200	9.300	6.100	1,717	В	2	2,000			
2	9.300	9.800	0.500	6,129	В	2	2,400			
3	9.800	11.400	1.600	6,505	В	2	2,000			
4	11.400	21.200	9.800	2,700	В	2	2,000			
5	21.200	31.600	10.400	1,739	В	2	2,000			
6	31.600	35.200	3.600	2,449	В	2	2,400			
Sum			32.000	21,239		12	12,800			

Segment	Weight	AADT	Level of Service		Capacity
1	19.1%	327		0.381	381
2	1.6%	96		0.031	38
3	5.0%	325		0.100	100
4	30.6%	827		0.613	613
5	32.5%	565		0.650	650
6	11.3%	276		0.225	270
Sum	100.0%	2,416	В	2.000	2,051

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 5i State Route 186 Data 2000

Within 100 km of the US-Mexico Border?					Υ	Υ			
Serves an International POE?					Υ	Υ			
Seg-	Begin End Length Avg Ann		Level of Service		Peak Hr				
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity		
1	0.000	2.100	2.100	7,300	В	2	2,000		
Sum 2.100 7,			7,300		2	2,000			

Segment	Weight	AADT	Level of Service		Capacity
1	100.0%	7,300		2.000	2,000
Sum	100.0%	7,300	В	2.000	2,000

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

# **IMPERIAL / MEXICALI CORRIDOR: CALENDAR YEAR 2020 DATA**

# Table 6a Interstate 8 Data 2020

Within 100 km of the US-Mexico Border?					Υ	Υ			
		ernational F			Υ	Υ			
Seg-	Begin	End	Length	Avg Ann	Level of	f Service			
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to	1 to	Traffic Capacity		
1									
2									
3									
4									
5									
6									
7									
8									
9									
10									
11									
12									
13									
14									
15									
16									
17	0.000	37.000	37.000	18,211	Α	1	4,000		
18	37.000	40.900	3.900	34,231	Α	1	4,000		
19	40.900	65.800	24.900	10,696	Α	1	4,000		
20	65.800	97.000	31.200	22,108	Α	1	4,000		
Sum			97.000	85,246		4	16,000		
Estimating	g the Weig	hted Averag	jes for I-8						
Segment	Weight	AADT		Level of Serv	/ice		Capacity		
1									
2									
3									
4									
5									
6									
7									
8									
9									
Segment	Weight	AADT		Level of Serv	/ice		Capacity		
10									
11									
12									
13									

14 15					
16					
17	38.1%	6,946		0.381	1,526
18	4.0%	1,376		0.040	161
19	25.7%	2,746		0.257	1,027
20	32.2%	7,111		0.322	1,287
Sum	100.0%	18,179	Α	1.000	4,000

Table 6b Interstate 10 Data 2020

			Mexico Bord	er?	Υ				
		ernational P			Υ				
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	A to F3	Service 1 to			
1									
2									
3									
4									
5									
6									
7									
8						1			
9									
10	1					-			
11	25.2	29.7	4.500	86,900	В	2	8,000		
12	29.7	44.4	14.700	143,100	E	5	8,000		
13	44.4	52.3	7.900	161,700	F0	6	8,000		
14	52.3	57.6	5.300	118,900	D	4	6,000		
15	57.600	105.100	47.500	38,500	В	2	4,000		
16	105.100	149.200	44.100	32,000	Α	1	4,000		
17	149.200	154.200	5.000	35,000	Α	1	4,000		
18	154.200	156.500	2.300	35,000	Α	1	4,000		
Sum			131.300	651,100		22	46,000		
Estimating	the Weial	nted Averag	es for I-10						
Segment	Weight	AADT		Level of Ser	vice		Capacity		
1									
2									
3									
4									
5									
6					1				
7									
8									
9					1				
10	2.404	2.070			0.070		274		
11	3.4%	2,978			0.069		274		
12	11.2%	16,021			0.560		896		
13	6.0%	9,729			0.361		481		
	4.0%	4,799			0.161		242		
14		13,928			0.724		1,447		
15	36.2%			1	0.336		1,343		
15 16	33.6%	10,748							
15 16 17	33.6% 3.8%	1,333			0.038		152		
15 16	33.6%			В					

Table 6c State Route 7 Data 2020

V	Within 100 km of the US-Mexico Border?					Υ			
Serves an International POE?				Υ					
Seg-	Begin	End	Length	Avg Ann	Level of Service		Peak Hr		
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity		
1	0.000	1.200	1.200	39,200	E	5	2,400		
2	1.200	6.700	5.500	23,800	С	3	2,400		
Sum	Sum			63,000		8	4,800		

Segment	Weight	AADT	Level of Service		Capacity
1	17.9%	7,021		0.896	430
2	82.1%	19,537		2.463	1,970
Sum	100.0%	26,558	С	3.358	2,400

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 6d State Route 78 Data 2020

Wi	thin 100 kr	n of the US-I	Vlexico Bord	er?	Υ	Υ				
Se	rves an Inte	ernational P	OE?		Υ					
Seg-	Begin	End	Length	Avg Ann	Level of	Service	)	Peak Hr		
ment	Post	Post	Miles	Daily	A to F3	1 to		Traffic		
#	Mile	Mile		Traffic				Capacity		
1										
2										
3										
4										
5										
6										
7										
8										
9										
10										
11										
12										
13	0.000	13.200	13.200	1,700	В	2		2,000		
14	13.200	13.800	0.600	15,000	Α	1		2,800		
15	13.800	15.000	1.200	21,000	Α	1		2,800		
16	15.000	18.700	3.700	5,500	В	2		2,000		
17	18.700	21.000	2.300	5,500	В	2		2,000		
Sum		-1	21.000	48,700		8		11,600		
Estimating	the Weigh	nted Average	es for SR 78							
Segment	Weight	AADT		Level of Ser	vice		Capa	city		
1										
2										
3										
4										
5										
6										
7										
8										
9										
10										
11										
12										
13	62.9%	1,069			1.257		1,257			
14	2.9%	429			0.029		80			
15	5.7%	1,200			0.057		160			
16	17.6%	969			0.352		352			
17	11.0%	602			0.219		219			
Sum	100.0%	4,269		Α	1.914		2,069	)		
			D = 4 F = 5 F0	) = 6, F1 = 7, F2 = 8			, ,			

Table 6e State Route 86 Data 2020

Wi	thin 100 kr	n of the US	Mexico Bord	er?	Υ	Υ					
Se	rves an Int	ernational P	OE?		Υ						
Seg-	Begin	End	Length	Avg Ann	Level o	f Servic	е	Peak Hr			
ment #	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to	)	Traffic Capacity			
1											
2											
3											
4											
5											
6		<u> </u>									
7											
8	18.900	20.600	1.700	23,000	Α	1		2,600			
9	20.600	21.400	0.800	20,400	В	2		2,400			
10	21.400	43.600	22.200	17,000	В	2		2,400			
11	43.600	56.100	12.500	16,000	В	2		2,400			
12	56.100	67.800	11.700	19,164	Α	1		2,800			
Sum			48.900	95,564		8		12,600			
Estimating	the Weigh	nted Averag	es for SR 86								
Segment	Weight	AADT	, -	Level of Ser	vice		Сар	acity			
1	<del>-</del>										
2											
3		†									
4		†									
5		1									
6		1									
7		†									
8	3.5%	800			0.035		90				
9	1.6%	334			0.033		39				
10	45.4%	7,718			0.908		1,09	0			
11	25.6%	4,090			0.511		613				
12	23.9%	4,585			0.239		670				
Sum	100.0%	17 526		Λ	1 726		2.50	\2			

 Sum
 100.0%
 17,526
 A
 1.726

 Notes:
 LOS coding:
 A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 6f State Route 98 Data 2020

V	Within 100 k	m of the US	Mexico Borde	r?	Υ						
5	Serves an Int	ernational F	POE?		Υ	Υ					
Seg- ment #	Begin	End	Length	Avg Ann	Level of	Service	Peak Hr				
	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity				
1											
2											
3	30.300	32.300	2.000	32,000	D	4	2,400				
4	32.300	32.900	0.600	37,400	D	4	2,400				
5	32.900	39.600	6.700	20,200	В	2	2,400				
6	39.600	42.100	2.500	5,300	В	2	2,000				
Sum			11.800	94,900		12	9,200				

Segment	Weight	AADT	Level of Serv	vice	Capacity			
1								
2								
3	16.9%	5,424		0.678	407			
4	5.1%	1,902		0.203	122			
5	56.8%	11,469		1.136	1,363			
6	21.2%	1,123		0.424	424			
Sum	100.0%	19,918	В	2.441	2,315			

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 6g State Route 111 Data 2020

W	ithin 100 km of t	he US-Mexi	co Border?		Υ				
Se	erves an Internati	ional POE?			Υ				
Seg- ment #	Begin	End	Length	Avg Ann Daily Traffic	Level of	f Service	Peak Hr		
	Post Mile	Post Mile	Miles		A to F3	1 to 9	Traffic Capacity		
1	0.000	1.200	1.200	47,800	D	4	3,000		
2	1.200	4.700	3.500	38,000	С	3	2,800		
3	4.700	7.700	3.000	34,727	С	3	2,800		
4	7.700	22.100	14.400	25,000	В	2	2,800		
5	Relinquished								
6	22.600	32.500	9.900	12,000	В	2	2,800		
Sum	•	•	32.000	157,527		14	14,200		

Segment	Weight	AADT	Level of	Service	Capacity
1	3.8%	1,793		0.150	113
2	10.9%	4,156		0.328	306
3	9.4%	3,256		0.281	263
4	45.0%	11,250		0.900	1,260
5					
6	30.9%	3,713		0.619	866
Sum	100.0%	24,167	В	2.278	2,808

Table 6h State Route 115 Data 2020

١	Within 100 k	m of the US	Mexico Borde	r?	Υ					
5	Serves an Int	ernational F	POE?		Υ	Υ				
Seg- ment #	Begin	End	Length	Avg Ann	Level of	f Service	Peak Hr			
	Post Mile	Post Mile	Miles	Daily Traffic	A to F3	1 to 9	Traffic Capacity			
1	3.200	9.300	6.100	6,631	В	2	2,000			
2	9.300	9.800	0.500	14,820	В	2	2,600			
3	9.800	11.400	1.600	10,481	С	3	2,000			
4	11.400	21.200	9.800	4,000	В	2	2,800			
5	21.200	31.600	10.400	5,577	В	2	2,400			
6	31.600	35.200	3.600	5,317	В	2	2,400			
Sum			32.000	46,826		13	14,200			

Segment	Weight	AADT	Level of Service		Capacity
1	19.1%	1,264		0.381	381
2	1.6%	232		0.031	41
3	5.0%	524		0.150	100
4	30.6%	1,225		0.613	858
5	32.5%	1,813		0.650	780
6	11.3%	598		0.225	270
Sum	100.0%	5,655	В	2.050	2,429

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

Table 6i State Route 186 Data 2020

V	Within 100 km of the US-Mexico Border?  Serves an International POE?				Υ					
S					Υ					
Seg- Begin		n End	Length	Avg Ann	Level of	f Service	Peak Hr			
ment	ent Post Post		Miles	Daily	A to	1 to	Traffic			
#	Mile	Mile		Traffic	F3	9	Capacity			
1	0.000	2.100	2.100	10,000	С	3	2,400			
Sum			2.100	10,000		3	2,400			

Segment	Weight	AADT	Level of Service		Capacity
1	100.0%	10,000		3.000	2,400
Sum	100.0%	10,000	С	3.000	2,400

**Notes:** LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

### LEVEL OF SERVICE LOOK UP TABLE

This table has two purposes:

- 1. The first purpose is to assign numbers to LOS letters. The LOS is provided by the State and is in the form of a letter, such as A, B, C, etc. These letters are converted to numbers using the following scheme: A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, F3=9.
- 2. The second purpose is to convert average LOS calculations to letters. This occurs after the weighted average is computed for a highway and for a corridor. The letters associated with the ranges are the following: A = 1.000 to 1.999; B = 2.000 to 2.999; C = 3.000 to 3.999; D = 4.000 to 4.999; E = 5.000 to 5.999; F0 = 6.000 to 6.999; F1 = 7.000 to 7.999; F2 = 8.000 to 8.999; F3 = 9.000

Table 7
Level of Service Look Up Table

	LOS	Number					
	Α	1					
	В	2					
	C	3					
	D	4					
	Е	5					
	FO	6					
	F1	7					
	F2	8					
	F3	9					
Note:	This table has two purposes	s:					
Hote.	• •	sign numbers to LOS letters.					
	The LOS is provided by the State and is in the form of a						
	letter, such as A, B, C, etc. These letters are						
	converted to numbers using the following scheme:						
	A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, F3=9						
	2. The second purpose is to	convert average LOS					
	• •	his occurs after the weighted					
		r a highway and for a corridor.					
	<del>-</del> -	ith the ranges are the following:					
	A = 1.000 to 1.999	3 · · · · · · · · · · · · · · · · · · ·					
	B = 2.000 to 2.999						
	C = 3.000 to 3.999						
	D = 4.000 to 4.999						
	E = 5.000 to 5.999						
	F0 = 6.000 to 6.999						
	F1 = 7.000 to 7.999						
	F2 = 8.000 to 8.999						
	F3 = 9.000						

# CORRIDOR EVALUATION CHIHUAHUA RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

GENERAL DESCRIPTION OF CHIHUAHUA'S CORRIDORS

Corridors

Chihuahua has identified six corridors for the evaluation and each corridor represents a portion of a highway. The corridor names, an identification letters [A to F], and the highway number or title are

contained in Table 6. Most tables contain the highway name and identification letter.

**Highways** 

The highways specified in this evaluation are the MX-2, MX-10, MX-16 and MX-45. Two unnumbered roads titled the Jeronimo-Samaluyuca-Chihuahua highway and the Guadalupe-

Samaluyuca-Chihuahua highway are also specified.

**Land Ports of Entry [POE]** 

There are ten land POEs in Chihuahua: El Berrendo, Gral. Rodrigo M. Quevedo (Palomas), Jeronimo, Paso del Norte (Santa Fe-Juarez), Buen Vecino (Puente Lerdo), Cordova, Zaragoza, Guadalupe Bravo, El Porvenir and Ojinaga. In calendar year 2000, about 707,000 trucks crossed the Mexico-US border

traveling south into Chihuahua through six land POEs. Also in calendar year 2000, about 17.8 million passenger vehicles and buses crossed the Mexico-US border into Chihuahua through all ten

land POFs.

**Airports** 

There are two airports that meet the minimum corridor evaluation criteria [located within 100 km of the Mexico-US border and designated as an international port of entry]. During calendar year

2000, airplanes arriving and departing at the Chihuahua and Juarez airports transported about

1,880 tons of goods.

Railroads

No rail data is included in the corridor evaluation because the BINS Technical representative did not provide rail crossing data for Chihuahua. There are two rail lines that cross the US-Mexico border

in Chihuahua.

**Maritime Ports** 

Chihuahua has no maritime ports and no plans to construct a maritime port between now and

2020.

**Source:** Chihuahua BINS Technical Committee representative.

#### **ANALYSIS OF CORRIDOR EVALUATION RESULTS**

The Mexico-Ciudad Juarez Corridor obtains its first place listing by virtue of the fact it is listed first with respect to the historical data and listed first with respect to the change data.

#### **Historical Data**

This discussion reviews highway, land POE and airport data and results. No maritime port or rail data is included in the evaluation because Chihuahua does not have a maritime port and there is not a rail line that crosses the Mexico-US border in Chihuahua. With regard to the highways, the Mexico-Ciudad Juarez Corridor is listed first because it is listed first in three of the four highway categories - AADT, highway length and capacity. This corridor dominates the AADT listing with 6,937 - this is twice as large as the corridor listed second [Ojinaga-Chihuahua] and 17 times larger than the corridor listed sixth [Jeronimo-Samalayuca-Chihuahua]. The highway length of the #1 corridor is about 26% longer than the second place corridor [580 km vs. 508 km] and its capacity is significantly greater than the other corridors. The El Berrendo corridor is the only other corridor with a #1 listing - it is listed #1 in LOS where it is rated a "B".

For truck, passenger vehicles and airport data, the Mexico-Ciudad Juarez Corridor is always listed first by virtue of the fact that the data are allocated by the distribution of AADT amongst six Corridors and Mexico-Ciudad Juarez has the largest AADT total of the six corridors.

## **Change Data**

This discussion reviews highway, land POE and airport data for both absolute changes and percent changes. With regard to absolute changes, the Mexico-Ciudad Juarez Corridor dominates the highways mode being listed first for two indicators [AADT and LOS] and tied for first for the other two indicators [highway length and capacity - there was no change in capacity or highway length for any of the six corridors].

For truck, passenger vehicles and buses, and airport data, the Mexico-Ciudad Juarez Corridor is always listed first by virtue of the fact that it had the largest data in 2000, while the growth rates for each mode is the same for all six of the corridors.

With regard to percent changes in highway data, the Jeronimo-Samalayuca-Chihuahua Corridor is listed first with respect to AADT with a growth rate of 82.5%. The other five corridors experienced a growth rate of 65.3%. For LOS, the Mexico-Ciudad Juarez Corridor is listed first with an increase of 168% as its LOS fell from A to B. Regarding highway length and capacity, all of the Corridors are tied for first with no change.

For trucks, passenger vehicles and buses, and airports, all six of the corridors are tied for first by virtue of the fact that each corridor has the same growth rate for each mode [[80.6% for trucks, 65.8% for passenger vehicles and buses, and 80.6% for airports.

Table 1
Summary Corridor Results

			Corric	dor Scores			E	valu	atio	n Res	ults	,
Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	E	F
Corridor Names:	Ciudad Juarez- Tijuana	El Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Historical Scores for 2000 [	Data <sup>1</sup>											
Highways	28	30	18	14	38	34	3	4	2	1	6	5
Land Ports of Entry	12	16	8	4	24	20	3	4	2	1	6	5
Airports	4	8	6	2	12	10	2	4	3	1	6	5
Maritime Ports <sup>2</sup>												
Railroads <sup>3</sup>												
Sum of Historical Scores:	44	54	32	20	74	64	3	4	2	1	6	5
Changes Scores Fo	or Change	s Between 20	00 and 2020 <sup>4</sup>									
Highways	14	18	18	9	23	16	2	5	5	1	6	3
Land Ports of Entry	8	10	6	4	14	12	3	4	2	1	6	5
Airports	4	5	3	2	7	6	3	4	2	1	6	5
Maritime Ports <sup>2</sup>												
Railroads <sup>3</sup>												
Sum of Changes Scores:	26	33	27	15	44	34	2	4	3	1	6	5
Overall Scores <sup>5</sup> :	70	87	59	35	118	98						
Overall Result:	3	4	2	1	6	5						

#### Notes:

- <sup>1</sup> Historical Scores from Table 1. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- <sup>2</sup> Chihuahua has no maritime ports
- The BINS Technical representative provided no data on railroad crossings. There are two rail lines that cross the Mexico-US border in Chihuahua.
- The Changes Scores is the sum of the Corridor Scores from Table 4 [Corridor Changes] and Corridor Scores Table 5 [Corridor Percent Changes].
- The Overall Score is the sum of the *Historical Score* and the *Changes Score*. The *Historical Data* scores and the *Changes Between 2000 and 2020* scores are equally weighted.

Lower score represents greater need.

Table 2 Corridor Data For 2000

Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Е	F
Corridor Names:	Ciudad Juarez- Tijuana	EI Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Highways												
Average Annual Daily Traffic	2,326	2,258	2,625	6,937	400	1,500	3	4	2	1	6	5
Highway Length [in km]	287.4	270.5	508.8	579.8	28.5	34.7	3	4	2	1	6	5
LOS [A=1 to F3 = 9]	1.7	2.9	1.7	1.0	1.0	1.0	3	1	3	4	4	4
Capacity at Peak Hour	2,040	1,393	2,366	6,715	2,200	2,200	5	6	2	1	3	3
						Highway Scores:	14	15	9	7	19	17
						Overall Highway Result:	3	4	2	1	6	5
Land Port of Entry Border	Crossings											<u> </u>
Number trucks	102,531	99,523	115,695	305,796	17,632	66,121	3	4	2	1	6	5
Total volume [tons]												<u> </u>
# passenger veh. & buses	2,584,688	2,508,855	2,916,543	7,708,758	444,486	1,666,824	3	4	2	1	6	5
						POE Scores:	6	8	4	2	12	10
						Overall POE Result:	2	4	3	1	6	5
Airports												<u> </u>
Total volume [tons]	273	265	308	813	47	176	3	4	2	1	6	5
						Airport Scores:	3	4	2	1	6	5
						Overall Airport Result:	2	4	3	1	6	5
Maritime Ports <sup>1</sup>												l
Total volume [tons]												
Total number TEUs												
						Maritime Port Scores: Overall Maritime Result:						
Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Ε	F

Corridor Names:	Ciudad Juarez- Tijuana	EI Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua					
Railroads Border Crossing	at POE <sup>2</sup>										
Number rail cars											
Total volume [tons]											
						Railroad Scores:					
						Overall Railroad Result:					
Total AADT in six Corridors		Share of AADT Among Corridors									
16,046	14.5%	14.1%	16.4%	43.2%	2.5%	9.3%					

#### Notes:

POE and Airport data are assigned to Corridors based on AADT distribution.

**Source:** Chihuahua BINS Technical Committee Representative, see Tables 6 - 9 for details.

Lower score represents greater need.

Chihuahua has no maritime ports.

The BINS Technical representative provided no data on railroad crossings. There are two rail lines that cross the Mexico-US border in Chihuahua.

Table 3
Corridor Data And Results For 2020

Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Ε	F
Corridor Names:	Ciudad Juarez- Tijuana	El Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Highways												
Average Annual Daily Traffic	3,845	3,732	4,338	11,466	730	2,480	3	4	2	1	6	5
Highway Length [in km]	287.4	270.5	508.8	579.8	28.5	34.7	3	4	2	1	6	5
LOS [A=1 to F3 = 9]	3.0	3.9	1.9	2.7	1.0	2.0	2	1	5	3	6	4
Capacity at Peak Hour	2,040	1,393	2,366	6,715	2,200	2,200	5	6	2	1	3	3
						Highway Scores:	13	15	11	6	21	17
						Overall Highway Result:	2	4	2	1	6	5
Land Port of Entry Border (	Crossings											
Number trucks	184,716	179,274	208,407	550,843	35,070	119,141	3	4	2	1	6	5
Total volume [tons]												
# passenger veh. & buses	4,274,775	4,148,833	4,823,027	12,747,812	811,596	2,757,202	3	4	2	1	6	5
						POE Scores:	6	8	4	2	12	10
						Overall POE Result:	2	4	3	1	6	5
Airports												
Total volume [tons]	491	477	554	1,464	93	317	3	4	2	1	6 6 6 3 21 6 6	5
						Airport Scores:	3	4	2	1	6	5
						Overall Airport Result:	2	4	3	1	6	5
Maritime Ports <sup>1</sup>												
Total volume [tons]												
Total number TEUs												
						Maritime Port Scores:						
						Overall Maritime Result:						

Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Ε	F
Corridor Names:	Ciudad Juarez- Tijuana	El Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Railroads Border Crossing	Railroads Border Crossing at POE <sup>2</sup>											
Number rail cars												
Total volume [tons]												
						Railroad Scores:						
						Overall Railroad Result:						
Total AADT in six Corridors			Share of	AADT Amor	ng Corridors							
26,591	14.5%	14.0%	16.3%	43.1%	2.7%	9.3%						

#### Notes:

POE and Airport data are assigned to Corridors based on AADT distribution.

Sources: Chihuahua BINS Technical Committee representative and the Mexican Secretariat of Communications and Transportation. See Tables 6 - 9 for details

Lower score represents greater need.

<sup>&</sup>lt;sup>1</sup> Chihuahua has no maritime ports.

<sup>&</sup>lt;sup>2</sup> The BINS Technical representative provided no data on railroad crossings. There are two rail lines that cross the Mexico-US border in Chihuahua

Table 4 Corridor Changes, 2000 - 2020

Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Е	F
Corridor Names:	Ciudad Juarez- Tijuana	El Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Highways												
Average Annual Daily Traffic	1,519	1,474	1,713	4,529	330	980	3	4	2	1	6	5
Highway Length [in km]	0.0	0.0	0.0	0.0	0.0	0.0	1	1	1	1	1	1
LOS [A=1 to F3 = 9]	1.300	0.950	0.171	1.676	0.000	1.000	2	4	5	1	6	3
Capacity at Peak Hour	0	0	0	0	0	0	1	1	1	1	1	1
						Highway Scores:	7	10	9	4	14	10
						Overall Highway Result:	2	2	5	1	6	4
Land Port of Entry Border	Crossings											
Number trucks	82,127	79,692	92,642	244,864	17,842	52,985	3	4	2	1	6	5
Total volume [tons]												
# passenger veh. & buses	1,690,078	1,639,970	1,906,474	5,039,028	367,166	1,090,373	3	4	2	1	6	5
						POE Scores:	6	8	4	2	1 6 1 14 6	10
						Overall POE Result:	2	4	3	1	6	5
Airports												
Total volume [tons]	218	212	246	651	47	141	3	4	2	1	6	5
						Airport Scores:	3	4	2	1	6	5
						Overall Airport Result:	2	4	3	1	6	5
Maritime Ports <sup>1</sup>												
Total volume [tons]												
Total number TEUs												
						Maritime Port Scores:						
						Overall Maritime						
						Result:						

Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Ε	F
Corridor Names:	Ciudad Juarez- Tijuana	EI Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Railroads Border Crossing a	at POE <sup>2</sup>											
Number rail cars												
Total volume [tons]												
						Railroad Scores:						
						Overall Railroad						
						Result:						
Total AADT in six Corridors			Share of	AADT Amo	ng Corridors							
10,545	14.4%	14.0%	16.2%	42.9%	3.1%	9.3%						

POE and Airport data are assigned to Corridors based on AADT distribution.

- Chihuahua has no maritime ports.
- The BINS Technical representative provided no data on railroad crossings. There are two rail lines that cross the Mexico-US border in Chihuahua

Differences are estimated by subtracting the year 2000 data from the 2020 projections. See Tables 6 - 9 for details.

Lower Score represents greater need.

Table 5 Corridor Percent Changes, 2000 - 2020

Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Ε	F
Corridor Names:	Ciudad Juarez- Tijuana	EI Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Highways												
Average Annual Daily Traffic	65.3%	65.3%	65.3%	65.3%	82.5%	65.3%	2	2	2	2	1	2
Highway Length [in km]	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	1	1	1	1	1	1
LOS [A=1 to F3 = 9]	76.5%	32.8%	10.2%	167.6%	0.0%	100.0%	3	4	5	1	6	2
Capacity at Peak Hour	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	1	1	1	1	1	1
						Highway Scores:	7	8	9	5	9	6
						Overall Highway Result:	3	4	5	1	5	2
Land Port of Entry Border	Crossings											
Number trucks	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	1	1	1	1	1	1
Total volume [tons]												
# passenger veh. & buses	65.8%	65.8%	65.8%	65.8%	65.8%	65.8%	1	1	1	1	1	1
						POE Scores:	2	2	2	2	2	2
						Overall POE Result:	1	1	1	1	1	1
Airports												
Total volume [tons]	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	1	1	1	1	1	1
						Airport Scores:	1	1	1	1	1	1
						Overall Airport Result:	1	1	1	1	1	1
Maritime Ports <sup>1</sup>												<u> </u>
Total volume [tons]												
Total number TEUs												
						Maritime Port Scores:						
						Overall Maritime Result:						

Corridor Identification:	Α	В	С	D	E	F	Α	В	С	D	Ε	F
Corridor Names:	Ciudad Juarez- Tijuana	EI Berrendo- Janos- Sueco- Chihuahua	Ojinaga- Chihuahua	Mexico- Ciudad Juarez	Jeronimo- Samalayuca- Chihuahua	Guadalupe- Samalayuca- Chihuahua						
Railroads Border Crossing	at POE <sup>2</sup>											
Number rail cars												
Total volume [tons]												
						Railroad Scores:						
						Overall Railroad						
						Result:						

See Tables 6 - 9 for details.

- <sup>1</sup> Chihuahua has no maritime ports.
- <sup>2</sup> The BINS Technical representative provided no data on railroad crossings. There are two rail lines that cross the Mexico-US border in Chihuahua.

Lower score represents greater need.

Table 6 Highway Data

Corridor ID	Highway	Corridor Name	km Highway	Avg Annual	Level of S		Traffic- Carrying
			Length	Daily Traffic	A to F3	1 to 9	Capacity
Historical	Data for Cale	ndar Year 2000					
Α	MX-2	Cd Juarez Tijuana	287.40	2,326	Α	1.7	2,040
В	MX-10	El Berrendo-Janos-Sueco- Chihuahua	270.50	2,258	В	2.9	1,393
С	MX-16	Ojinaga-Chihuahua	508.80	2,625	Α	1.7	2,366
D	MX-45	Mexico-Cd Juarez	579.78	6,937	Α	1.0	6,715
E	Santa Teresa-Sam	Jeronimo-Samalayuca-Chihuahua	28.50	400	А	1.0	2,200
F	Guadaloupe- Sam	Guadalupe-Samalayuca- Chihuahua	34.70	1,500	А	1.0	2,200
Projection	ns for 2020						
Α	MX-2	Cd Juarez Tijuana	287.40	3,845	С	3.0	2,040
В	MX-10	El Berrendo-Janos-Sueco- Chihuahua	270.50	3,732	С	3.9	1,393
С	MX-16	Ojinaga-Chihuahua	508.80	4,338	Α	1.9	2,366
D	MX-45	Mexico-Cd Juarez	579.78	11,466	В	2.7	6,715
E	Santa Teresa-Sam	Jeronimo-Samalayuca-Chihuahua	28.50	730	А	1.0	2,200
F	Guadalupe- Sam	Guadalupe-Samalayuca- Chihuahua	34.70	2,480	В	2.0	2,200

LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

**Source:** Chihuahua BINS Technical Committee Representative

Table 7
Land Ports of Entry [POE] Crossing Data

					Ι				I		
	El Berrendo	Palomas	Jeronimo	Santa Fe Juárez	Puente Lerdo	Cordova	Zaragoza	Guadalupe	El Porvenir	Ojinaga	Total
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	10141
Southbound POE Crossing	Data for 200	<b>0</b> ¹									
Number trucks	0	4,366	29,820	0	0	334,918	330,982	108	0	7,104	707,298
Tons of goods  Value [Millions \$] moved by truck											0 \$0.0
Number of passenger vehicles	2,106	367,100	204,799	4,631,951	165,674	7,019,100	3,936,433	553,338	177,481	760,809	17,818,791
Number of buses	153	282	32	1,888	0	8,415	263	0	0	331	11,364
Number passenger vehicles & buses											17,830,155
Number of rail cars Volume of tons moved by											X
rail Number of TEUs moved by rail											X
Value [Millions \$] moved by rail											Х
Southbound POE Crossing	Data for 202	<b>0</b> <sup>2</sup>									
Number trucks											1,277,451
Tons of goods Value [Millions \$] moved by truck											
Number of passenger vehicles											X
Number of buses											X
Number passenger vehicles & buses											29,563,244
Number of rail cars											X
Volume of tons moved by rail											X
Number of TEUs moved by rail											X

Value [Millions \$] moved by rail											X
	El Berrendo	Palomas	Jeronimo	Santa Fe Juárez	Puente Lerdo	Cordova	Zaragoza	Guadalupe	El Porvenir	Ojinaga	Total
Per Cent Change in POE Da	ta: 2000 to 2	.020									
Number trucks <sup>3</sup>											80.6%
Tons of goods											
Value [Millions \$] moved by truck											
Number of passenger vehicles											Х
Number of buses											Χ
Number passenger vehicles & buses <sup>4</sup>											65.8%
Number of rail cars											Χ
Volume of tons moved by rail											Х
Number of TEUs moved by rail											Х
Value [Millions \$] moved by rail											Х

Number of trucks = southbound trucks that cross the Mexico-US border

Tons of goods = carried by southbound trucks that cross the Mexico-US border.

Value [Millions \$] moved by truck = value of goods moved by southbound trucks that cross the Mexico-US border.

Number of passenger vehicles = southbound passenger vehicles that cross the Mexico-US border.

Number of buses = southbound buses that cross the Mexico-US border.

Number passenger vehicles & buses = sum of southbound passenger vehicles and buses that cross the Mexico-US border.

Number of rail cars = southbound rail cars that cross the Mexico-US border.

Volume of tons moved by rail = transported by the southbound rail cars that cross the Mexico-US border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are southbound and cross Mexico-US border.

Value [Millions \$] moved by rail = value of goods transported by southbound rail cars that cross the Mexico-US border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- From the Chihuahua BINS Technical Committee representative.
- <sup>2</sup> Calculated by Multiplying 2000 Historical Data by Growth Rates
- The 80.6% growth rate for truck data is based on a compound annual growth rate of 3.0% the level specified by the Mexican Secretariat of Communications and Transportation.
- The growth rate for passenger vehicles and buses is the same as that observed for the change in Average Annual Daily raffic [AADT] in the highway segments nearest the Mexico-US border. These AADT data were obtained for MX-16, MX-45, Santa Teresa- Samaluyuca-Chihuahua Highway and the Guadalupe-Samaluyuca-Chihuahua Highway. The total change in AADT was 8,729 or 65.8%. The 65.8% is used to forecast the number of border crossings for passenger vehicles and buses in 2020. These data come from the Chihuahua BINS Technical Committee representative.

Table 8 **Airport Data** 

	Chihuahua	Juarez	Total
Within 100 km of the US-Mexico Border?	Yes	Yes	
Designated as an International POE?	Yes	Yes	
Historical Data for 2000			
Longest runway length [in meters].			
Tons of goods exported & imported	1,531	349	1,880
Airport served by railroad facility?			Χ
If yes, name of railroad			Χ
On-land movement of air freight	Χ	Χ	Χ
Share of goods moved by truck			Χ
Share of goods moved by railroad			Χ
Projections for 2020 <sup>1</sup>			
Longest runway length			
Date becomes operational			Χ
Tons of goods exported & imported			3,395
Airport served by railroad facility?			Χ
If yes, name of railroad			Χ
On-land movement of air freight	Χ	Χ	Χ
Share of goods moved by truck			
Share of goods moved by railroad			
Per Cent Change: 2000 to 2020 <sup>2</sup>			
Longest runway length			
Tons of goods exported & imported			80.6%

Only data for facilities that meet minimum criteria are included

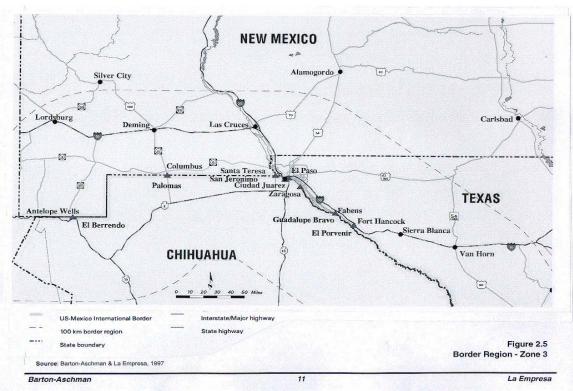
**Source:** Historical Data = Chihuahua BINS Technical Committee representative.

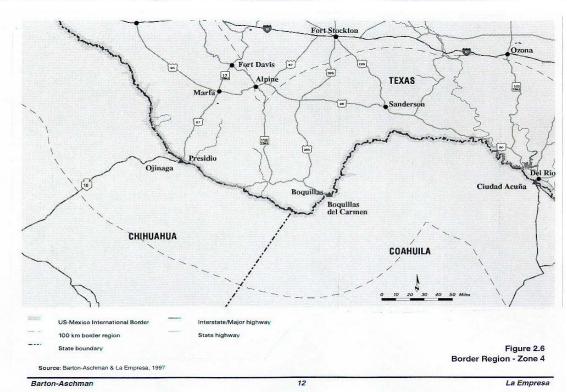
Calculated by Multiplying 2000 Historical Data by Growth Rates.
 The 80.6% growth rate for airport volume is based on a compound annual growth rate of 3.0% - the level the level specified by the Mexican Secretariat of Communications and Transportation.

#### Table 9 Maritime Port Data

There are **NO MARITIME PORTS** in Chihuahua

Map 1 Chihuahua Border Area





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#### CHIHUAHUA HIGHWAY DATA

# Methodology for Calculating Corridor Averages for Average Annual Daily Traffic [AADT], Level of Service [LOS], and Peak Hour Traffic Carrying Capacity

Corridor totals for highways are obtained for highway length, AADT, LOS and Peak Hour Traffic Carrying Capacity. The corridor total for each of these indicators is obtained by adding the data for each of the highways assigned to the corridor. The State BINS Technical Committee representative assigned the highways to the corridors. Each of the compilations for each of the indicators is now reviewed.

**Highway Length**—the length of each highway within the 100 km limit. The length is obtained for each highway by subtracting the beginning mile marker, from the last mile marker. If segments are omitted, those segments and their data are omitted from the highway total. The highway length for the entire corridor is obtained by summing the highway length for each highway in the corridor.

**Weighted Average**—an average in which each of the observations is multiplied [or "weighted"] by a factor before calculations. In addition, these weights sum to unity or one [1]. Weighted averages are used so that short and long segments of roadway are counted proportionately in calculating the average for the entire highway.

Average Annual Daily Traffic—the weighted average AADT for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the AADT for that segment to obtain the weighted AADT for the segment. Step 3: The weighted AADT for all the segments are summed to obtain the weighted average AADT for the highway. The weighted average AADT for all the highways in the corridor are then summed to obtain the Corridor Total AADT.

**Level of Service**—the weighted average LOS for each highway is calculated in the same manner as that used for AADT. A major difference is that LOS is provided in the letters A, B, C, D, E, F0, F1, F2 and F3. These letters are converted to numbers using the following system, A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, and F3=9. After the conversions the following steps are used to calculate LOS for each highway. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the LOS number for that segment to obtain the weighted LOS number for all the segments are summed to obtain the weighted average LOS for the highway. The weighted average LOS number for all the highways in the corridor are then summed to obtain the Corridor Total LOS.

**Peak Hour Traffic Carrying Capacity [PCAP]**—the weighted average PCAP for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the PCAP for that segment to obtain the weighted PCAP for the segment. Step 3: The weighted PCAP for all the segments are summed to obtain the weighted average PCAP for the highway. The weighted average PCAP for all the highways in the corridor are then summed to obtain the Corridor Total PCAP.

		Table 1		
		way Data Compiled Into		
C		able 5 of Corridor Evalua		OC and Consider
Segment	Length is the Basis to	or Estimating the Weight	ed Average for AADI, L	US and Capacity
		uana Corridor	El Berrendo J	anos Corridor
	MX-2 for 2000	MX-2 for 2020	MX-10 for 2000	MX-10 for 2020
AADT:	2,326	3,845	2,258	3,732
Highway Length:	287.4	287.4	270.5	270.5
LOS:	A	С	В	С
Weighted Average LOS:	1.7	3.0	2.9	3.9
Capacity:	2,040	2,040	1,393	1,393
		pampo Corridor	Mexico-Cd. Ju	uarez Corridor
	MX-16 for 2000	MX-16 for 2020	MX-45 for 2000	MX-45 for 2020
AADT:	2,625	4,338	6,937	11,466
Highway Length:	508.8	508.8	579.8	579.8
LOS:	A	A	A	В
Weighted Average LOS:	1.7	1.9	1.0	2.7
Capacity:	2,366	2,366	6,715	6,715
		ihuahua Corridor		ahua Corridor
		ıca-Chihuahua Highway		ca-Chihuahua Highway
AADT:	<b>2000</b> 400	<b>2020</b> 730	<b>2000</b> 1,500	<b>2020</b> 2,480
Highway Length:	28.5	28.5	34.7	34.7
LOS:	A	A	A	В
Weighted Average LOS:	1.0	1.0	1.0	2.0
Capacity:	2,200	2,200	2,200	2,200
LOS	coding: $A = 1$ , $B = 2$ , $C = 3$ , $D = 3$	O = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F	3 = 9	

		Table 2			
	First Segm	ent Growth R	ates		
	Average	Annual Daily	Traffic	Percent	Port of Entry to which the
	2000	2020	Change	Change	Highway is Connected
Segment 1 of Highways Directly Connected to the	a Land Ports of	Entry			
MX - 16	855	1,413	558	65.3%	San Jerónimo
MX - 45	10,510	17,371	6,861	65.3%	Guadalupe Bravo
Santa Teresa-Samaluyuca-Chihuahua Highway	400	730	330	82.5%	Ojinaga
Guadalupe-Samaluyuca-Chihuahua Highway	1,500	2,480	980	65.3%	Juárez
Total:	13,265	21,994	8,729	65.8%	
Notes:					
The AADT shown above is the value for the first segr					
Change is the difference between the two numbers,	and the Percent Cl	hange is calculated	l by dividing the di	fference by the	AADT for
calendar year 2000.					
All of these highways are directly connected to the L	and Ports of Entry,	, and the US-Mexic	o border.		
The total growth rate of 65.8% is the growth rate th	at is used to calcul	ate the 2020 borde	er crossings of pass	enger vehicles a	nd buses.
Source:					
Chihuahua BINS Technical Committee representative					

							Table 3	3						
	1					Ciudad Ju	ıarez - Tiju	ıana Corri	dor			I	I	
			MX-2 (	Calendar Yea	ar 2000					MX-2 (	Calendar Yea	r 2020		
	Within 10	0 km of the	e US-Mexic	o Border?	Υ			Within 10	0 km of th	e US-Mexic	o Border?	Υ		
	Serves an	Internatio	nal POE?		Y			Serves an	Internatio	nal POE?		Y		
Seg-	Begin	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level o	f Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F3	9	Capacity	km	km	km	Traffic	F3	9	Capacity
1	0.000	112.000	112.000	3,116	В	2	2,040	0.000	112.000	112.000	5,150	С	3	2,040
2	112.000	170.950	58.950	2,325	В	2	2,040	112.000	170.950	58.950	3,843	C	3	2,040
3	170.950	190.600	19.650	2,325	В	2	2,040	170.950	190.600	19.650	3,959	С	3	2,040
4	190.600	205.000	14.400	2,285	В	2	2,040	190.600	205.000	14.400	3,777	C	3	2,040
5	0.000	61.000	61.000	1,245	A	1	2,040	0.000	61.000	61.000	2,058	C	3	2,040
6	61.000	82.400	21.400	1,245	A	1	2,040	61.000	82.400	21.400	2,058	C	3	2,040
- 0	01.000	02.400	21.400	1,243		'	2,040	01.000	02.400	21.400	2,030		3	2,040
		Sum	287.400	12,611		10	12,240		Sum	287.400	20,844		18	12,240
			Estimatino	the Weight	ed Aversa	os for 200	<u> </u>			Estimating	the Weight	nd Averag	es for 202	0
		Segment	Weight	AADT		f Service	Capacity		Segment		AADT		f Service	Capacity
		Segment	ii cigii c	ААВІ	Level o	Jei vice	capacity		Segment	g.i.c	АЛ	Level o	Jei Vice	Capacity
		1	39.0%	1,214		0.779	795		1	39.0%	2,007		1.169	795
		2	20.5%	477		0.410	418		2	20.5%	788		0.615	418
		3	6.8%	164		0.137	139		3	6.8%	271		0.205	139
		4	5.0%	114		0.100	102		4	5.0%	189		0.150	102
		5	21.2%	264		0.212	433		5	21.2%	437		0.637	433
		6	7.4%	93		0.074	152		6	7.4%	153		0.223	152
0.0%		Sum	100.0%	2,326	Α	1.713	2,040		Sum	100.0%	3,845	С	3.000	2,040
lotes:	LOS coding	: A = 1, B = 2,	C = 3, D = 4,	E = 5, F0 = 6, F	1 = 7, F2 = 8,	F3 = 9								
Source:	Chihuahua	BINS Technica	I Committee	representative										

59.000 114.000 257.000 13.500	Length km 59.000 55.000 81.000 62.000 13.500	Avg Ann Daily Traffic  2,302 2,396 2,399 2,313 400	Y Y Level o A to F3  C C C C A	f Service 1 to 9	Peak Hr Traffic Capacity 1,351 1,351 1,351	Begin Post km  0.000 59.000	End Post km 59.000 114.000	Length km	Avg Ann Daily Traffic 3,805	Y Y Level of A to F3	1 to 9	Peak Hr Traffic Capacity
End Post km 59.000 114.000 195.000 257.000 13.500	Length km 59.000 55.000 81.000 62.000 13.500	Avg Ann Daily Traffic  2,302 2,396 2,399 2,313	Y Level o A to F3  C C C C	1 to 9	Peak Hr Traffic Capacity 1,351 1,351	Begin Post km  0.000 59.000	End Post km	Length km	Avg Ann Daily Traffic	Y Level of A to F3	1 to 9	Traffic Capacity
Fnd Post km 59.000 114.000 195.000 257.000 13.500	<b>Length km</b> 59.000  55.000  81.000  62.000  13.500	Daily Traffic 2,302 2,396 2,399 2,313	Level o A to F3  C C C C	1 to 9	1,351 1,351	Begin Post km  0.000 59.000	End Post km	Length km	Daily Traffic	Level of A to F3	1 to 9	Traffic Capacity
Post km 59.000 114.000 195.000 257.000 13.500	59.000 55.000 81.000 62.000 13.500	Daily Traffic 2,302 2,396 2,399 2,313	A to F3  C C C C	1 to 9	1,351 1,351	Post km 0.000 59.000	Post km 59.000	<b>km</b> 59.000	Daily Traffic	A to F3	1 to 9	Traffic Capacity
Post km 59.000 114.000 195.000 257.000 13.500	59.000 55.000 81.000 62.000 13.500	Daily Traffic 2,302 2,396 2,399 2,313	A to F3  C C C C	1 to 9	1,351 1,351	Post km 0.000 59.000	Post km 59.000	<b>km</b> 59.000	Daily Traffic	A to F3	1 to 9	Traffic Capacit
59.000 114.000 195.000 257.000 13.500	59.000 55.000 81.000 62.000 13.500	2,302 2,396 2,399 2,313	C C C C	3 3 3	1,351 1,351	0.000 59.000	<b>km</b> 59.000	<b>km</b> 59.000	Traffic	F3		
114.000 195.000 257.000 13.500	55.000 81.000 62.000 13.500	2,302 2,396 2,399 2,313	C C	3	1,351 1,351	59.000				D	_	
114.000 195.000 257.000 13.500	55.000 81.000 62.000 13.500	2,396 2,399 2,313	C C	3	1,351	59.000			3,805	D	_	-
195.000 257.000 13.500	81.000 62.000 13.500	2,399 2,313	C C	3			114 000				4	1,351
257.000 13.500	62.000 13.500	2,313	С		1,351	444000	114.000	55.000	3,960	D	4	1,351
13.500	13.500	•	_			114.000	195.000	81.000	3,965	D	4	1,351
		400	٨	3	1,351	195.000	257.000	62.000	3,823	D	4	1,351
Sum	270.500		_ ^	1	2,200	0.000	13.500	13.500	661	Α	1	2,200
	_, 5.5	9,810		13	7,604		Sum	270.500	16,214		17	7,604
	Estimating	the Weight	ed Averag	es for 200	0			Estimating	the Weight	ed Average	es for 202	<b>D</b>
Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
1	21.8%	502		0.654	295		1	21.8%	830		0.872	295
												275
												405
_									<u> </u>			310
5	5.0%	20		0.050	110		5	5.0%	33		0.050	110
Sum	100.0%	2,258	В	2.900	1,393		Sum	100.0%	3,732	С	3.850	1,393
	1 2 3 4 5	Segment Weight  1 21.8% 2 20.3% 3 29.9% 4 22.9% 5 5.0%	Segment         Weight         AADT           1         21.8%         502           2         20.3%         487           3         29.9%         718           4         22.9%         530           5         5.0%         20	Segment         Weight         AADT         Level of the control of the cont	Segment         Weight         AADT         Level of Service           1         21.8%         502         0.654           2         20.3%         487         0.610           3         29.9%         718         0.898           4         22.9%         530         0.688           5         5.0%         20         0.050	1     21.8%     502     0.654     295       2     20.3%     487     0.610     275       3     29.9%     718     0.898     405       4     22.9%     530     0.688     310       5     5.0%     20     0.050     110	Segment         Weight         AADT         Level of Service         Capacity           1         21.8%         502         0.654         295           2         20.3%         487         0.610         275           3         29.9%         718         0.898         405           4         22.9%         530         0.688         310           5         5.0%         20         0.050         110	Segment         Weight         AADT         Level of Service         Capacity         Segment           1         21.8%         502         0.654         295         1           2         20.3%         487         0.610         275         2           3         29.9%         718         0.898         405         3           4         22.9%         530         0.688         310         4           5         5.0%         20         0.050         110         5	Segment         Weight         AADT         Level of Service         Capacity         Segment         Weight           1         21.8%         502         0.654         295         1         21.8%           2         20.3%         487         0.610         275         2         20.3%           3         29.9%         718         0.898         405         3         29.9%           4         22.9%         530         0.688         310         4         22.9%           5         5.0%         20         0.050         110         5         5.0%	Segment         Weight         AADT         Level of Service         Capacity         Segment         Weight         AADT           1         21.8%         502         0.654         295         1         21.8%         830           2         20.3%         487         0.610         275         2         20.3%         805           3         29.9%         718         0.898         405         3         29.9%         1,187           4         22.9%         530         0.688         310         4         22.9%         876           5         5.0%         20         0.050         110         5         5.0%         33	Segment         Weight         AADT         Level of Service         Capacity         Segment         Weight         AADT         Level of Service           1         21.8%         502         0.654         295         1         21.8%         830           2         20.3%         487         0.610         275         2         20.3%         805           3         29.9%         718         0.898         405         3         29.9%         1,187           4         22.9%         530         0.688         310         4         22.9%         876           5         5.0%         20         0.050         110         5         5.0%         33	Segment         Weight         AADT         Level of Service         Capacity         Segment         Weight         AADT         Level of Service           1         21.8%         502         0.654         295         1         21.8%         830         0.872           2         20.3%         487         0.610         275         2         20.3%         805         0.813           3         29.9%         718         0.898         405         3         29.9%         1,187         1.198           4         22.9%         530         0.688         310         4         22.9%         876         0.917           5         5.0%         20         0.050         110         5         5.0%         33         0.050

						Dalla	s - Topolo	bampo Co	orridor					
			MX-16	Calendar Yea	ar 2000					MX-16	Calendar Yea	ar 2020		
		0 km of the		o Border?	Υ				0 km of the		o Border?	Y		
	Serves an	Internatio	nal POE?		Y			Serves an	Internatio	nal POE?		Y		<del> </del>
Seg-	Begin	End		Avg Ann	Level of	Service	Peak Hr	Begin	End		Avg Ann	Level of	f Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F3	9	Capacity	km	km	km	Traffic	F3	9	Capacity
1	0.000	6.500	6.500	7,817	Α	1	4,976	0.000	6.500	6.500	12,920	В	2	4,976
2	6.500	26.800	20.300	5,103	Α	1	4,976	6.500	26.800	20.300	8,434	Α	1	4,976
3	26.800	141.000	114.200	996	Α	1	2,162	26.800	141.000	114.200	1,646	Α	1	2,162
4	141.000	224.000	83.000	855	В	2	1,299	141.000	224.000	83.000	1,413	В	2	1,299
5	0.000	10.500	10.500	11,694	Α	1	4,790	0.000	10.500	10.500	19,328	С	3	4,790
6	10.500	36.200	25.700	6,175	Α	1	4,790	10.500	36.200	25.700	10,206	Α	1	4,790
7	36.200	103.500	67.300	6,452	Α	1	4,790	36.200	103.500	67.300	10,664	Α	1	4,790
8	103.500	107.100	3.600	4,451	Α	1	4,790	103.500	107.100	3.600	7,357	Α	1	4,790
9	107.100	150.800	43.700	4,006	D	4	1,299	107.100	150.800	43.700	6,621	Е	5	1,299
10	0.000	16.000	16.000	1,446	В	2	1,299	0.000	16.000	16.000	2,390	С	3	1,299
11	16.000	70.000	54.000	741	В	2	1,299	16.000	70.000	54.000	1,225	В	2	1,299
12	70.000	134.000	64.000	412	В	2	859	70.000	134.000	64.000	681	В	2	859
		Sum	508.800	50,148		19	37,329		Sum	508.800	82,887		24	37,329
			Estimating	the Weighte	ed Average	es for 200	0			Estimating	the Weight	ed Average	es for 202	0
		Segment	Weight	AADT		Service	Capacity		Segment		AADT		f Service	Capacity
		1	1.3%	100		0.013	64		1	1.3%	165		0.026	64
		2	4.0%	204		0.040	199		2	4.0%	337		0.040	199
		3	22.4%	224		0.224	485		3	22.4%	369		0.224	485
		4	16.3%	139		0.326	212		4	16.3%	231		0.326	212
		5	2.1%	241		0.021	99		5	2.1%	399		0.062	99
		6	5.1%	312		0.051	242		6	5.1%	516		0.051	242
		7	13.2%	853		0.132	634		7	13.2%	1,411		0.132	634
		8	0.7%	31		0.007	34		8	0.7%	52		0.007	34
		9	8.6%	344		0.344	112		9	8.6%	569		0.429	112
		10	3.1%	45		0.063	41		10	3.1%	75		0.094	41
		11	10.6%	79		0.212	138		11	10.6%	130		0.212	138
		12	12.6%	52		0.252	108		12	12.6%	86		0.252	108
		Sum	100.0%	2,625	A	1.684	2,366		Sum	100.0%	4,338	Α	1.856	2,366
	Notes:	LOS codina.	Δ = 1 R = 2	C = 3, D = 4, E =	= 5 F0 = 6 F1	l = 7 F2 = 8	F3 = 9							
	Source:			C = 3, B = 4, E =		/, / 2 = 0,								+
	2001601	Similadilad D	recinica		JJCI ILUCIVE	1		1					1	

						Mexi	co Ciudad	Juarez Co	rridor					
			MX-45	Calendar Yea	ar 2000					MX-45	Calendar Yea	ar 2020		
	Within 10	0 km of the	a IIS-Maxic	n Rorder?	Y			Within 10	0 km of the	a IIS-Mayic	n Rorder?	Υ		
		Internatio		o border.	Y			Serves an			o Border.	Y		
Seg-	Begin	End		Avg Ann	Level of	Service	Peak Hr	Begin	End		Avg Ann	Level o	f Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F3	9	Capacity	km	km	km	Traffic	F3	9	Capacity
													_	
1	0.000	68.980	68.980	5,168	Α	1	7,012	0.000	68.980	68.980	8,542	В	2	7,012
2	68.980	111.500	42.520	5,110	Α	1	7,012	68.980	111.500	42.520	8,446	В	2	7,012
3	111.500	138.000	26.500	8,359	Α	1	7,012	111.500	138.000	26.500	13,816	С	3	7,012
4	138.000	166.870	28.870	10,887	Α	1	4,976	138.000	166.870	28.870	17,995	С	3	4,976
5	166.870	210.000	43.130	9,005	Α	1	4,976	166.870	210.000	43.130	14,884	С	3	4,976
6	210.000	222.560	12.560	10,840	Α	1	4,976	210.000	222.560	12.560	17,917	С	3	4,976
7	0.000	7.200	7.200	12,190	Α	1	7,012	0.000	7.200	7.200	20,148	D	4	7,012
8	7.200	55.380	48.180	8,534	Α	1	7,012	7.200	55.380	48.180	14,105	С	3	7,012
9	55.380	60.480	5.100	6,381	Α	1	7,012	55.380	60.480	5.100	10,547	С	3	7,012
10	60.480	155.870	95.390	6,756	Α	1	7,012	60.480	155.870	95.390	11,167	С	3	7,012
11	0.000	83.630	83.630	4,699	Α	1	7,012	0.000	83.630	83.630	7,767	В	2	7,012
12	83.630	167.650	84.020	6,194	Α	1	7,012	83.630	167.650	84.020	10,238	C	3	7,012
13	167.650	197.920	30.270	8,674	Α	1	7,012	167.650	197.920	30.270	14,337	C	3	7,012
14	197.920	201.350	3.430	10,510	Α	1	7,012	197.920	201.350	3.430	17,371	C	3	7,012
15	201.350	219.000						201.350	219.000					
		Sum	579.780	113,307		14	92,060		Sum	579.780	187,279		40	92,060
	Notes:	LOS coding:	A = 1, B = 2,	C = 3, D = 4, E =	= 5, F0 = 6, F1	l = 7, F2 = 8,	F3 = 9							
	Source:	Chihuahua	INC Tochnica	l Committee rep	rocontativo									
	Source:	Crimuanua B	ымэ тесппіса	Committee rep	resentative									

	MX-45	Calendar Ye	ar 2000				MX-45	Calendar Ye	ar 2020				
	Estimating	the Weight	ed Average	s for 200	0	Estimating the Weighted Averages for 2020							
Segment	Weight	AADT	Level of	Service	Capacity	Segment	Weight	AADT	Level of S	ervice	Capacity		
1	11.9%	615		0.119	834	1	11.9%	1,016		0.238	834		
2	7.3%	375		0.073	514	2	7.3%	619		0.147	514		
3	4.6%	382		0.046	320	3	4.6%	631		0.137	320		
4	5.0%	542		0.050	248	4	5.0%	896		0.149	248		
5	7.4%	670		0.074	370	5	7.4%	1,107		0.223	370		
6	2.2%	235		0.022	108	6	2.2%	388		0.065	108		
7	1.2%	151		0.012	87	7	1.2%	250		0.050	87		
8	8.3%	709		0.083	583	8	8.3%	1,172		0.249	583		
9	0.9%	56		0.009	62	9	0.9%	93		0.026	62		
10	16.5%	1,112		0.165	1,154	10	16.5%	1,837		0.494	1,154		
11	14.4%	678		0.144	1,011	11	14.4%	1,120		0.288	1,011		
12	14.5%	898		0.145	1,016	12	14.5%	1,484		0.435	1,016		
13	5.2%	453		0.052	366	13	5.2%	749		0.157	366		
14	0.6%	62		0.006	41	14	0.6%	103		0.018	41		
15						15							
Sum	100.0%	6,937	Α	1.000	6,715	Sum	100.0%	11,466	В	2.676	6,715		

	Level	of Service Lo	ook Up Table	T
	LOS	Number		
	LOS	Hallibei		
	Α	1		
	В	2		
	С	3		
	D	4		
	Е	5		
	F0	6		
	F1	7		
	F2	8		
	F3	9		
Note:	This table has two	purposes:		
	1. The first purpos	se is to assign num	bers to LOS letters.	
	The LOS is prov	ided by the State	and is in the form o	f a
		A, B, C, etc. These		
		umbers using the		
	A=1, B=2, C=3,	D=4, E=5, F0=6, F		
	2. The second pur	•		
			rs after the weighte	
			yay and for a corridency anges are the follow	
	A = 1.000 to 1		Tinges are the follow	virig.
	B = 2.000 to 1			
	C = 3.000 to 3.			
	D = 4.000 to 4			
	E = 5.000 to 5.			
	F0 = 6.000 to 6			
	F1 = 7.000 to 7	7.999		
	F2 = 8.000 to 8	3.999		
	F3 = 9.000			

## CORRIDOR EVALUATION COAHUILA RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

#### GENERAL DESCRIPTION OF COAHUILA'S CORRIDORS

#### Corridors

Coahuila identified four corridors for the study and they are called the Piedras Negras-Ciudad [Cd] Acuña Corridor, the Morelos-Cd. Acuña Corridor, the Sabinas-Piedras Negras Corridor and the Boquillas del Carmen a Muzquiz Corridor. The Coahuila BINS Technical Committee representative provided no data on the Boquillas del Carmen a Muzquiz Corridor.

#### **Highways**

The Piedras Negras-Cd. Acuña Corridor is composed of one highway: MX-2. The Morelos-Cd. Acuña Corridor is composed of one highway: MX-29. The Sabinas-Piedras Negras Corridor is composed of one highway: MX-57. No highways were identified and assigned to the Boquillas del Carmen a Muzquiz Corridor. No Level of service [LOS] or highway capacity data are available, therefore, the current and future level of congestion on Coahuila's corridor cannot be established.

#### **Land Ports of Entry [POE]**

There are four bridge POE crossings on the Mexico-U.S. border in Coahuila. Trucks cross at two of the bridges while passenger vehicles and buses cross at all four. In calendar year 2000, about 183,000 trucks crossed into Coahuila through the two bridge POEs and about 5.5 million passenger vehicles and buses entered Coahuila through the four bridges.

#### **Airports**

No data for Airports were specified by the Coahuila BINS Technical Committee Representative

#### Railroads

The Ferrocarnil Mexicano [FERROMEX] Rail Line operates in two of the four corridors: The Piedras Negras-Cd. Acuña and the Morelos-Cd. Acuña. No data was provided for this rail line by the Coahuila BINS Technical Committee representative.

#### **Maritime Ports**

There are NO MARITIME PORTS in Coahuila.

**Source:** Coahuila BINS Technical Committee representative, the Mexican Secretariat of Communication and Transportation and the Texas BINS Technical Committee representative. See Tables 6-9 for details.

#### **ANALYSIS OF CORRIDOR EVALUATION RESULTS**

The Sabinas-Piedras Negras Corridor is listed first. The Morelos-Ciudad. Acuña Corridor is listed second. The Piedras Negras-Ciudad Acuña Corridor is listed third. The Sabinas-Piedras Negras Corridor is listed first by virtue of the fact that it is listed first with respect to historical data and change data.

#### **Historical Data**

This discussion reviews highway and land POE with their results. With regard to the highways, the Sabinas-Piedras Negras Corridor is listed first followed by the Piedras Negras-Cd. Acuña Corridor and then by the Morelos-Cd. Acuña Corridor. The Sabinas-Piedras Negra Corridor is listed first for AADT [99,016] and second in highway length [133 km] while the Piedras Negras-Cd. Acuña Corridor is listed first for highway length [219.3 km] and third for AADT [1,521]. No Level of service [LOS] or highway capacity data are available, therefore, the current and future level of congestion on Arizona's corridor cannot be established.

For truck and passenger vehicle data, the Sabinas-Piedras Negras Corridor is always listed first by virtue of the fact that data are allocated based on the distribution of AADT amongst the Corridors and, as noted above, the Sabinas-Piedras Negras is listed first with respect to AADT.

There are no maritime ports in Coahuila and no data were provided for airports and railroads.

#### **Change Data**

This discussion reviews highway and land POE data for both absolute changes and percent changes. With regard to absolute changes in highway data, the Sabinas-Piedras Negras Corridor is listed first by virtue of the fact that it is listed first for AADT with an increase of 9,978. In addition, the Sabinas-Piedras Negras Corridor is tied for first for highway length with the other corridors where there was no change with regard to highway length.

For trucks and passenger vehicles, the Sabinas-Piedras Negras Corridor is always listed first by virtue of the fact that its 2000 year data is greater than the other three corridors and all the corridors use the same growth rates.

With regard to percent changes in highway data, the Piedras Negras-Cd. Acuña Corridor is listed first because that it is listed first in AADT growth [with 165.3%] and tied for first in growth of highway length with the other three corridors [where there was no change].

For trucks and passenger vehicles, the four corridors are always tied for first by virtue of the fact that the growth rates are the same for each corridor.

There are no maritime ports in Coahuila and no data were provided for airports and railroads.

Note: There is a fourth corridor titled the Boquillas del Carmen a Muzquiz Corridor; however, no information was provided on this corridor.

### Table 1 **Summary Corridor Results**

		Corrido	r Scores <sup>1</sup>		E۱	/aluati	on Res	ults
	Α	В	С	$D^2$	Α	В	С	D
	P. Negras- Cd. Acuña	Morelos - Cd. Acuña	Sabinas- P. Negras	Boquillas del Carmen a Muzquiz <sup>2</sup>				
Historical Data for 2000 <sup>3</sup>								
Highways	8	10	6		2	3	1	
Land Ports of Entry	12	8	4		3	2	1	
Airports <sup>4</sup>								
Maritime Ports <sup>5</sup>								
Railroads <sup>6</sup>								
Sum of Historical Scores:	20	18	10		3	2	1	
Changes Between 2000 and 2020 <sup>7</sup>								
Highways	5	8	5		1	3	1	
Land Ports of Entry	8	6	4		3	2	1	
Airports <sup>4</sup>								
Maritime Ports⁵								
Railroads <sup>6</sup>								
Sum of Change Scores:	13	14	9		2	3	1	
Overall Scores <sup>8</sup> :	33	32	19					
Overall Result:	3	2	1					

- The Corridor Scores are the Evaluation Results in Tables 2, 4 and 5.
- The Coahuila BINS Technical representative specified four corridors, including a corridor titled the Boquillas del Carmen a Muzquiz Corridor. However no highways were identified and assigned to this corridor, and no data are provided for the corridor. Historical Scores from Table 2. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- No data were provided on airport traffic.
- There are no maritime ports in Coahuila.
- No data were provided on railroad traffic.
- The Changes Scores is the sum of the Corridor Scores from Table 3 [Corridor Changes] and the Corridor Scores from Table 5 [Corridor Changes] Percent Changes].
- The Overall Score is the sum of the Historical Score and the Changes Score The Historical Data scores and A17the Changes Between 2000 and 2020 scores are equally weighted.

Table 2 Corridor Data For 2000

		Corrido	r Raw Data		Eva	luatio	n Res	ults
	Α	В	С	D	Α	В	С	D
	P. Negras- Cd. Acuña	Morelos - Cd. Acuña	Sabinas- P. Negras	Boquillas del Carmen a Muzquiz				
Highways								
Average Annual Daily Traffic	1,521	1,916	6,050		3	2	1	
Highway Length [in Km.]	219.3	104.0	133.0		1	3	2	
LOS [A=1 to F = 9]								
Capacity at Peak Hour								
		Highway So	cores		4	5	3	
		Overall Hig	hway Result		2	3	1	
Land Port of Entry Border Crossing								
Number trucks	29,326	36,942	116,648		3	2	1	
Total volume [tons]								
Value of goods Millions \$								
# passenger vehicles & buses	874,081	1,101,078	3,476,785		3	2	1	
		POE Scores			6	4	2	
		Overall PO	Result		3	2	1	
Airports <sup>1</sup>								
Total volume [tons]								
		Airport Sco	res					
		Overall Air	port Result					
Maritime Ports - NONE								
Total volume [millions tons]								
Total number TEUs								
		Maritime P	ort Score					
		Overall Ma	ritime Result					
Railroads Border Crossing at POE <sup>1</sup>								
Number rail cars								
Total volume [tons]								
Total Number TEUs								
Value of goods Millions \$								
		Railroad Sc	ores					
		Overall Rai	Iroad Result					
Total AADT in Three Corridors	Sh	are of AADT	Among Corri	dors				
9,487	16.0%	20.2%	63.8%	0.0%				

POE data are assigned to Corridors based on AADT distribution.

**Sources:**Coahuila BINS Technical Committee representative and the Mexican Secretariat of Communications and Transportation. See Tables 6 - 9 for details.

No data were provided on airports or railroads.

Table 3 **Corridor Data And Results For 2020** 

		Corridor	Raw Data		Eva	aluatio	n Resu	ilts
	Α	В	С	D	Α	В	С	D
	P. Negras-	Morelos -	Sabinas-	Boquillas				
	Cd. Acuña	Cd.	P. Negras	del				
		Acuña		Carmen a				
				Muzquiz				
Highways								
Average Annual Daily Traffic	4,035	5,015	16,028		3	2	1	
Highway Length [in Km.]	219.3	104.0	133.0		1	3	2	
LOS [A=1 to F = 9]								
Capacity at Peak Hour								
		Highway So			4	5	3	
		Overall Hig	hway Result		2	3	1	
Land Port of Entry Border Crossing								
Number trucks	53,155	66,065	211,143		3	2	1	
Total volume [tons]								
Value of goods Millions \$								
# passenger vehicles & buses	1,945,644	2,418,193	7,728,572		3	2	1	
		POE Scores			6	4	2	
		Overall PO	E Result		3	2	1	
Airports <sup>1</sup>								
Total volume [tons]								
		Airport Sco						
		Overall Air	port Result					
Maritime Ports - None								
Total volume [million tons]								
Total number TEUs								
		Maritime P	ort Score					
		Overall Ma	ritime Result					
Railroads Border Crossing at POE <sup>1</sup>								
Number rail cars								
Total volume [tons]								
Total Number TEUs								
Value of goods Millions \$								
		Railroad So	ores					
		Overall Rai	Iroad Result	•				
Total AADT in Three Corridors	Shai	re of AADT A	mong Corrido	ors				
25,078	16.1%	20.0%	63.9%	0.0%				
Notes								

POE data are assigned to Corridors based on AADT distribution.

1 No data were provided on airports or railroads.

**Sources:**Coahuila BINS Technical Committee representative and the Mexican Secretariat of Communications and Transportation. See Tables 6 - 9 for details.

Table 4 Corridor Changes and Results, 2000 - 2020

	Co	orridor Raw D			Eva	aluatio	n Resu	lts
	Α	В	С	D	Α	В	С	D
	P. Negras- Cd. Acuña	Morelos - Cd. Acuña	Sabinas- P. Negras	Boquillas del Carmen a Muzquiz				
Highways								
Average Annual Daily Traffic	2,514	3,099	9,978		2	3	1	
Highway Length [in Km.]	0.00	0.00	0.00		1	1	1	
LOS [A=1 to F = 9]								
Capacity at Peak Hour								
		Highway Sc			3	4	2	
		Overall High	hway Result		2	3	1	
Land Port of Entry Border								
Crossing								
Number trucks	23,775	29,308	94,364		3	2	1	
Total volume [tons]								
Value of goods Millions \$								
# passenger vehicles & buses	1,070,754	1,319,916	4,249,796		3	2	1	
		POE Scores			6	4	2	
		Overall POE	Result		3	2	1	
Airports <sup>1</sup>								
Total volume [tons]								
		Airport Sco			· · · · ·			
		Overall Airp	ort Result					
Maritime Ports - NONE								
Total volume [tons]								
Total number TEUs								
		Maritime Po	ort Score					
			ritime Result					
Railroads Border Crossing at POE <sup>1</sup>								
Number rail cars								
Total volume [tons]								
Total Number TEUs								
Value of goods Millions \$								
		Railroad Sc	ores					
		Overall Rail	road Result					
Total AADT in Three Corridors	Sh	are of AADT	Among Corrido	ors				
15,591	16.1%	19.9%	64.0%	0.0%			1	
Nistan	П	1	l .			·		l

POE data are assigned to Corridors based on AADT distribution.

 No data were provided on airports or railroads.
 Differences are estimated by subtracting the year 2000 data from the 2020 projections. See Tables 6 – 9 for details.

Table 5 Corridor Percent Changes, 2000 - 2020

		Corridor	Raw Data		Eva	aluatio	n Resu	ılts
	Α	В	С	D	Α	В	С	D
	P. Negras- Cd. Acuña	Morelos - Cd. Acuña	Sabinas- P. Negras	Boquillas del Carmen a Muzquiz				
Highways								
Average Annual Daily Traffic	165.3%	161.7%	164.9%		1	3	2	
Highway Length [in Km.]	0.0%	0.0%	0.0%		1	1	1	
LOS [A=1 to F = 9]								
Capacity at Peak Hour								
		Highway Sco	ores		2	4	3	
		Overall High	way Result		1	3	2	
Land Port of Entry Border Crossing								
Number trucks	80.6%	80.6%	80.6%		1	1	1	
Total volume [tons]								
Value of goods Millions \$								
# passenger vehicles & buses	121.8%	121.8%	121.8%		1	1	1	
		POE Scores			2	2	2	
		Overall POE	Result		1	1	1	
Airports <sup>1</sup>								
Total volume [tons]								
		Airport Scor	es					
		Overall Airp	ort Result					
Maritime Ports - NONE								
Total volume [tons]								
Total number TEUs <sup>1</sup>								
		Maritime Po	rt Score					
		Overall Mari	time Result					
Railroads Border Crossing at POE <sup>1</sup>								
Number rail cars								
Total volume [tons]								
Total Number TEUs								
Value of goods Millions \$								
		Railroad Sco	res					
		Overall Railr	oad Result					

<sup>&</sup>lt;sup>1</sup> No data were provided on airports or railroads. See Tables 5 - 8 for details.

Table 6 Highway Data

Summar	y Data for the Pie	edras Negras-Cd	. Acuña Corrid	lor							
Cale	ndar Year 2000		Projections	for 2020							
	MX-2	Total	MX-2	Total							
AADT:	1,521	1,521	4,035	4,035							
Highway Length:	219.3	219.3	219.3	219.3							
Sumi	mary Data for the	Morelos-Cd. Ac	uña Corridor								
Calendar Year 2000 Projections for 2020											
	MX-29	Total	MX-29	Total							
AADT:	1,916	1,916	5,015	5,015							
Highway Length:	104.0	104.0	104.0	104.0							
Summa	ary Data for the S	abinas-Piedras N	Negras Corrido	or							
Cale	ndar Year 2000		Projections	for 2020							
	MX-57	Total	MX-57	Total							
AADT:	6,050	6,050	16,028	16,028							
Highway Length:	133.0	133.0	133.0	133.0							

Note: The Coahuila BINS Technical representative specified four corridors, including a corridor titled the Boquillas del Carmen a Muzquiz Corridor. However no highways were identified and assigned to this corridor, and no data are provided for the corridor.

**Source:** Coahuila BINS Technical Committee Representative and the Mexican Secretariat of Communications and Transportation

Table 7
Compiled Coahuila [POE] Crossing Data

	Ciudad Acuña	Ciudad Acuña II Presa La Amistad	Piedras Negras	Camino Real- Coahuila Piedras Negras II	Total
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	
Southbound POE Crossing Data for 20	000¹				
Number trucks	74,023	0	0	108,892	182,915
Tons of goods					
Value [Millions \$] moved by truck					
Number of passenger vehicles	2,043,686	41,528	1,192,316	2,166,363	5,443,893
Number of buses	5,374	0	2,068	608	8,050
Number passenger vehicles & buses					5,451,943
Number of rail cars					X
Volume of tons moved by rail					X
Number of TEUs moved by rail					X
Value [Millions \$] moved by rail					X
Southbound POE Crossing Data for 20	)20²:				
Number trucks					330,363
Tons of goods					
Value [Millions \$] moved by truck					
Number of passenger vehicles					Х
Number of buses					Χ
Number passenger vehicles & buses					12,092,410
Number of rail cars					Χ
Volume of tons moved by rail					X
Number of TEUs moved by rail					X
Value [Millions \$] moved by rail					X
Per Cent Change in POE Data: 2000 to	2020				
Number trucks <sup>3</sup>					80.6%
Tons of goods					
Value [Millions \$] moved by truck					
Number of passenger vehicles					Х
Number of buses					Х
Number passenger vehicles & buses <sup>4</sup>					121.8%
Number of rail cars					X
Volume of tons moved by rail					X
Number of TEUs moved by rail					X
Value [Millions \$] moved by rail					Χ

Number of trucks = southbound trucks that cross the US-Mexico border

Tons of goods = carried by southbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by southbound trucks that cross the US-Mexico border.

 $Number\ of\ passenger\ vehicles = southbound\ passenger\ vehicles\ that\ cross\ the\ US-Mexico\ border.$ 

Number of buses = southbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of southbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = southbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by the southbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are southbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by southbound rail cars that cross the US-Mexico border. Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- <sup>1</sup> For 'Ciudad Acuña', the data comes from the Coahuila BINS Technical Committee representative. For 'Ciudad Acuna II", 'Piedras Negras' & 'Camino Real-Coahuila', SourcePoint uses data provided by the Texas BINS Technical Committee representative for Northbound trucks, passenger vehicles and buses that cross into the US at those POE. The Texas data on trucks, passenger vehicles and buses are assumed to be the same for Southbound traffic, therefore, the same numbers are used for the Sourthbound numbers for these three ports of entry.
- <sup>2</sup> Calculated by Multiplying 2000 Historical Data by Growth Rates
- <sup>3</sup> The 80.6% growth rate for truck data is based on a compound annual growth rate of 3.0% the level specified by the Mexican Secretariat of Communications and Transportation
- The growth rate for passenger vehicles and buses is the same as that observed for the change in Average Annual Daily Traffic [AADT] in the highway segments nearest the Mexico-US border. These AADT data were obtained for MX-29 and MX-57 from the Coahuila BINS Technical Committee representative. The total change in AADT is17,631 or 121.8%. The 121.8% is used to forecast the number of border crossings for passenger vehicles and buses in 2020.

### Table 8 Airport Data

No airport data was provided.

### Table 9 Maritime Port Data

There are **NO MARITIME PORTS** in Coahuila.

Map 1 Coahuila Border Area



#### **COAHUILA HIGHWAY DATA**

### Methodology For Calculating Corridor Averages for Average Annual Daily Traffic [AADT], Level of Service [LOS], and Peak Hour Traffic Carrying Capacity

Corridor totals for highways are obtained for highway length, AADT, LOS and Peak Hour Traffic Carrying Capacity. The corridor total for each of these indicators is obtained by adding the data for each of the highways assigned to the corridor. The State BINS Technical Committee representative assigned the highways to the corridors. Each of the compilations for each of the indicators is now reviewed.

**Highway Length**—the length of each highway within the 100 km limit. The length is obtained for each highway by subtracting the beginning mile marker, from the last mile marker. If segments are omitted, those segments and their data are omitted from the highway total. The highway length for the entire corridor is obtained by summing the highway length for each highway in the corridor.

**Weighted Average**—an average in which each of the observations is multiplied [or "weighted"] by a factor before calculations. In addition, these weights sum to unity or one [1]. Weighted averages are used so that short and long segments of roadway are counted proportionately in calculating the average for the entire highway.

Average Annual Daily Traffic—the weighted average AADT for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the AADT for that segment to obtain the weighted AADT for the segment. Step 3: The weighted AADT for all the segments are summed to obtain the weighted average AADT for the highway. The weighted average AADT for all the highways in the corridor are then summed to obtain the Corridor Total AADT.

**Level of Service**—the weighted average LOS for each highway is calculated in the same manner as that used for AADT. A major difference is that LOS is provided in the letters A, B, C, D, E, F0, F1, F2 and F3. These letters are converted to numbers using the following system, A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, and F3=9. After the conversions the following steps are used to calculate LOS for each highway. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the LOS number for that segment to obtain the weighted LOS number for all the segments are summed to obtain the weighted average LOS for the highway. The weighted average LOS number for all the highways in the corridor are then summed to obtain the Corridor Total LOS.

**Peak Hour Traffic Carrying Capacity [PCAP]**—the weighted average PCAP for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the PCAP for that segment to obtain the weighted PCAP for the segment. Step 3: The weighted PCAP for all the segments are summed to obtain the weighted average PCAP for the highway. The weighted average PCAP for all the highways in the corridor are then summed to obtain the Corridor Total PCAP.

	Uiab	Table 1	nto Corridor Form	
11.			aluation for Coahuil	
Segment Leng	th is the E	Basis for Estimatin	g the Weighted Aver	age for AADT
			gras-Cd. Acuña Corrido	
Cale	ndar Year 2		,	ections for 2020
	MX-2	Total	MX-2	Total
AADT:	1,521	1,521	4,035	4,035
Highway	-			
Length:	219.3	219.3	219.3	219.3
	Summary	Data for the Morelo	s-Cd. Acuña Corridor	
Cale	ndar Year 2			ections for 2020
	MX-29	Total	MX-29	Total
AADT:	1,916	1,916	5,015	5,015
Highway	1,910	1,310	5,015	5,015
Length:	104	104.0	104	104.0
	ummary Da ndar Year 2		Piedras Negras Corrido	r ections for 2020
Care	MX-57	Total	MX-57	Total
AADT:	6,050	6,050	16,028	16,028
Highway Length:	133	133.0	133	133.0
		Muzquiz Corridor is a pi	oposed corridor, does not ex	xist, and there are
no data for it				

				Table					
			The Pied	ras Negras-G	Cd. Ad	uña Corri	dor		
			ndar Year	2000			MX-2 Calend	lar Year 202	20
		he US-Mexic	o Border?		Υ				
serves a	n Internat	ional POE?			Y				
Seg-	Begin	End		Avg Ann		Begin	End		Avg Ann
ment	Post	Post	Length	Daily		Post	Post	Length	Daily
#	Mile	Mile	Miles	Traffic		Mile	Mile	Miles	Traffic
1	0.000	46.000	46.000	2,652		0.000	46.000	46.000	7,037
2	46.000	83.300	37.300	2,280		46.000	83.300	37.300	6,050
3	83.300	83.300	0.000	2,260		83.300	83.300	0.000	5,711
4	0.000	16.900	16.900	1,870		0.000	16.900	16.900	4,962
5	16.900	42.000	25.100	580		16.900	42.000	25.100	1,539
6	42.000	42.000	0.000	842		42.000	42.000	0.000	2,234
7	42.000	113.000	71.000	700		42.000	113.000	71.000	1,857
8	0.000	10.600	10.600	1,721		0.000	10.600	10.600	4,566
9	10.600	23.000	12.400	995		10.600	23.000	12.400	2,640
10	23.000	23.000	0.000	590		23.000	23.000	0.000	1,565
		Sum	219.300	14,490			Sum	219.300	38,161
			Fstima	ting the We	iahte	d Average	) 		
		MX-2 C	alendar Ye			u /iveiuge		Calendar Ye	ar 2020
		Segment	Weight	AADT			Segment	Weight	AADT
		Segment	weight	AADI			Segment	Weight	AADI
		1	21.0%	556			1	21.0%	1,476
		2	17.0%	388			2	17.0%	1,029
		3	0.0%	0			3	0.0%	0
		4	7.7%	144			4	7.7%	382
		5	11.4%	66			5	11.4%	176
		6	0.0%	0			6	0.0%	0
		7	32.4%	227			7	32.4%	601
		8	4.8%	83			8	4.8%	221
		9	5.7%	56			9	5.7%	149
		10	0.0%	0			10	0.0%	0
		S.L.	100.0%	1,521			Cum	100.0%	4,035
		Sum	100.070	1,521			Sum	100.070	4,033
		Coahuila BINS							

					ble 3				
			Th	e Morelos-C	d. Ac	uña Corrid	or		
		MX-29 Cal	endar Year	2000			MX-29 Cal	endar Year 2	020
Within 1	100 km of t	he US-Mexic			Υ				
	n Internat				Υ				
Seg-	Begin	End		Avg Ann		Begin	End		Avg Ann
ment	Post	Post	Length	Daily		Post	Post	Length	Daily
#	Mile	Mile	Miles	Traffic		Mile	Mile	Miles	Traffic
1	0.000	9.000	9.000	3,343		0.000	9.000	9.000	8,870
2	9.000	69.000	60.000	1,810		9.000	69.000	60.000	4,802
3	69.000	87.000	18.000	1,779		69.000	87.000	18.000	4,720
4	87.000	104.000	17.000	1,677		87.000	104.000	17.000	4,036
5	104.000	104.000	0.000	3,930		104.000	104.000	0.000	4,127
		Sum	104.000	12,539			Sum	104.000	26,555
			Estir	mating the \	Neigl	hted Avera	nges		
		MX-29	Calendar Y	ear 2000			MX-2	29 Calendar `	Year 2020
		Segment	Weight	AADT			Segment	Weight	AADT
		1	8.7%	289			1	8.7%	768
		2	57.7%	1,044			2	57.7%	2,770
		3	17.3%	308			3	17.3%	817
		4	16.3%	274			4	16.3%	660
		Sum	100.0%	1,916			Sum	100.0%	5,015
	Source:	Coahuila BINS	Technical Cor	 nmittee represei	ntative				

				Table	e 4				
			Sal	binas-P. Neg	gras C	orridor			
		MX-57 Cal	endar Year	2000			MX-57 Calen	dar Vear 20	20
Within 1	100 km of t	he US-Mexic			Υ		Carent	aai icai 20	
	an Internat				Y				
Seg-	Begin	End		Avg Ann		Begin	End		Avg Ann
ment	Post	Post	Length	Daily		Post	Post	Length	Daily
#	Mile	Mile	Miles	Traffic		Mile	Mile	Miles	Traffic
1	115.000	118.850	3.850	6,960		115.000	118.850	3.850	17,588
2	118.850	126.300	7.450	6,505		118.850	126.300	7.450	17,260
3	126.300	182.000	55.700	6,175		126.300	182.000	55.700	16,384
4	182.000	187.200	5.200	5,800		182.000	187.200	5.200	15,389
5	187.200	206.850	19.650	6,350		187.200	206.850	19.650	16,848
6	206.850	240.280	33.430	5,620		206.850	240.280	33.430	14,912
7	240.280	248.000	7.720	5,530		240.280	248.000	7.720	14,673
8	248.000	248.000	0.000	10,545		248.000	248.000	0.000	27,979
		Sum	133.000	53,485			Sum	133.000	141,033
		Juin	133.000	33,463			Juin	133.000	141,033
			Fstim	ating the We	iahte	d Δverages			
		MX-57	Calendar Y		giite	a Averages	MX-57	Calendar Y	ear 2020
		Segment	Weight	AADT			Segment	Weight	AADT
		Segment	Weight	AADI			Segment	Weight	AADI
		1	2.9%	201			1	2.9%	509
		2	5.6%	364			2	5.6%	967
		3	41.9%	2,586			3	41.9%	6,862
		4	3.9%	227			4	3.9%	602
		5	14.8%	938			5	14.8%	2,489
		6	25.1%	1,413			6	25.1%	3,748
		7	5.8%	321			7	5.8%	852
		8	0.0%	0			8	0.0%	0
		Sum	100.0%	6,050			Sum	100.0%	16,028
		Julii	100.0 /0	0,030			Julii	100.0 /0	10,020
		6 1 11 81116	T 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1						
	Source:	Coanulia BINS	rechnical Con	nmittee represe	ntative		1		

# CORRIDOR EVALUATION NEW MEXICO RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

#### GENERAL DESCRIPTION OF NEW MEXICO'S CORRIDORS

#### **Corridors**

New Mexico has identified three corridors for the study and they are called the I-10 corridor, the North-South corridor, and the Midwest corridor.

# **Highways**

The I-10 corridor is composed of seven highways: Interstate 10 [I-10], United States Highway 180 [US-180], New Mexico Route 9 [NM 9], NM 11, NM 81, NM 136 and NM 146. The North-South corridor is composed of one highway and it is Interstate 25. The Midwest corridor is composed of two highways: US-54 and US-70.

# Land Ports of Entry [POE]

There are three land POEs in New Mexico: Antelope Wells, Columbus and Santa Teresa. The City of Sunland Park is proposing a new, non-commercial POE to be opened about five miles east of Santa Teresa. In calendar year 2000, about 37,000 trucks carrying about 387,000 tons of goods were transported into New Mexico through two land POEs. Also in calendar year 2000, about 466,000 passenger vehicles crossed the border into New Mexico through the four land POEs. The State of New Mexico envisions that truck crossings will increase almost 10-fold to 354,000 in 2020, while passenger vehicle crossings will increase almost 7-fold to 3.7 million passenger vehicles in 2020.

# **Airports**

There are two airports located within 100 km of the US-Mexico border that are designated as international ports of entry; they are the Dona Ana County Airport and Las Cruces International Airport. The longest runway in 2000 is at Dona Ana at 8,500 feet. Both airports plan to lengthen their runway length by 2020. Dona Ana's will increase to 10,000 feet while Las Cruces will increase to 10,600 feet. No tonnage is reported for either airport. Dona Ana rarely receives shipments and for Las Cruces, goods that used to be transported there, are now transported at the airport in El Paso.

#### Railroads

There are two railroads that operate within 100 km of the US-Mexico border and they are the Burlington Northern Santa Fe [BNSF] and the Union Pacific [UP]. The BNSF operates in the North-South corridor. The UP operates in the I-10 corridor. No rail lines currently cross at any land POE in New Mexico. There is a proposal to move the rail crossing that currently crosses the international boundary between downtown Juarez, Mexico and El Paso, Texas, to the Santa Teresa POE in New Mexico. This is proposed to occur during the next 20 years. Once completed, it is projected that the number of rail cars crossing the border will be about 73,000 in 2020 transporting about 1.9 million tons of goods. The railroads that will use this crossing are the BNSF [operating in the North-South corridor] and the UP [operating in the East-West corridor].

#### **Maritime Ports**

New Mexico has no maritime ports and no plans to construct a maritime port between now and 2020.

**Source:** New Mexico BINS Technical Committee representative.

#### **ANALYSIS OF CORRIDOR EVALUATION RESULTS**

The I-10 corridor is listed first. The Midwest Corridor is listed second. The North-South Corridor is listed third. The I-10 corridor obtains its first place listing by being listed first with respect to the historical data, and being listed for first with respect to the change data.

#### **Historical Data**

This discussion will review highway land POE data with their results. With regard to the highways, the I-10 corridor is listed first because it is listed first in all four categories [AADT, highway length, LOS and capacity]. The Midwest corridor is listed second in all four categories and the North-South corridor is listed third or last in all four categories. The I-10 corridor had 42% more AADT then the Midwest corridor [26,450 versus 15,340] and is more than three times larger than the North-South corridor [26,450 versus 7,964]. The I-10 corridor has five times as many highway miles as the Midwest corridor [522 versus 104] and about 9 times more than the North-South corridor [522 versus 60]. The LOS is similar for all the three corridors with each receiving an "A" [the LOS numbers are the following: I-10 = 1.4, Midwest = 1.1 and North-South = 1.0]. The I-10 corridor has about 10%

more highway capacity than the Midwest corridor [13,816 versus 12,344] and twice as much capacity as the North-South corridor [13,816 versus 6,120].

For truck and passenger vehicle data, the I-10 corridor is always listed first by virtue of the fact that those data are distributed by the distribution of AADT amongst the corridors. For railroads and maritime ports, none of the corridors are ranked because no goods were transported by these modes.

# **Change Data**

This discussion will review highway, land POE and rail data for both absolute changes and percent changes. With regard absolute changes in highway data, the I-10 corridor is listed first by virtue of the fact that it is listed first in two categories [LOS and capacity] and tied for first in another category [highway length where there was no change in any of the corridors]. In the case of AADT, the Midwest corridor increased slightly more than the AADT change for the I-10 corridor [16,420 versus 15,477].

For trucks and passenger vehicles, the I-10 corridor is always listed first by virtue of the fact that the its 2000 year data are larger than the other two corridors, but all three corridors used the same growth rates. For railroad data, the I-10 and North-South corridors are tied for first because all rail crossing data is split between these two corridors.

With regard to percent changes in highway data, the I-10 corridor is listed first by virtue of the fact that it is listed first in two categories [LOS and capacity] and tied for first in another category [highway length where there was no change]. The Midwest corridor is listed second overall with a first place listing for AADT [its growth rate is 107% versus 58.5% for the I-10 corridor and 55.4% for the North-South corridor], a first place tie for highway length, a second place tie for capacity and a third place listing for LOS.

For trucks and passenger vehicles, the three corridors are always tied for first by virtue of the fact that the truck rate is the same for each corridor and the passenger vehicle growth rate is the same for each corridor. For railroad data, the I-10 and North-South corridors are tied for first because all rail crossing data is split between these two corridors.

Table 1
Summary Corridor Results

	С	orridor Sco	res <sup>1</sup>	Evalu	uation R	esults
	Α	В	С	Α	В	С
	I-10	North- South	Midwest			
Historical Data for 2000 <sup>2</sup>						
Highways	8	24	16	1	3	2
Land Ports of Entry	8	24	16	1	3	2
Airports <sup>3</sup>						
Maritime Ports <sup>4</sup>						
Railroads <sup>5</sup>						
Sum of Historical Scores:	16	48	32	1	3	2
Changes Between 2000 and 2020 <sup>6</sup>						
Highways	10	16	14	1	3	2
Land Ports of Entry	12	16	8	2	3	1
Airports <sup>3</sup>						
Maritime Ports <sup>4</sup>						
Railroads <sup>5</sup>	8	8	20	1	1	3
Sum of Change Scores:	30	40	42	1	2	3
Overall Scores <sup>7</sup> :	46	88	74			
Overall Result:	1	3	2			

- $^{\,1}$   $\,$  The Corridor Scores are the Evaluation Results in Tables 2, 4 and 5.
- <sup>2</sup> Historical Scores from Table 2. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- New Mexico has two airports within 100 km of the US-Mexico border and designated as international ports of entry, however, there is limited data on goods movement and most of the goods movement now occurs at the airport in El Paso.
- <sup>4</sup> New Mexico has no maritime ports.
- <sup>5</sup> There are no railroad crossings at land POE in New Mexico today. The State of New Mexico envisions this will change by 2020 as the rail crossing on the US-Mexico border between Juarez and El Paso [in Texas] will be relocated to the Santa Teresa POE in New Mexico.
- <sup>6</sup> The Changes Scores is the sum of the Corridor Scores from Table 4 [Corridor Changes] and the Corridor Scores from Table 5 [Corridor Percent Changes].
- <sup>7</sup> The Overall Score is the sum of the *Historical Score* and the *Changes Score The Historical Data scores* and A17the *Changes Between 2000 and 2020* scores are equally weighted.

Lower Score represents greater need.

Table 2 Corridor Data For 2000

	Co	rridor Raw D	ata	Ev	valuatio Results	
	Α	В	С	Α	В	С
	I-10	North- South	Midwest			
Highways						
Average Annual Daily Traffic	26,450	7,964	15,340	1	3	2
Highway Length [in Km.]	522.70	60.00	104.10	1	3	2
LOS [A=1 to F = 9]	1.371	1.000	1.079	1	3	2
Capacity at Peak Hour	13,816	6,120	12,344	1	3	2
		Hig	hway Scores	4	12	8
	Overall Highway Result				3	2
Land Port of Entry Border Crossing						
Number trucks	19,576	5,895	11,353	1	3	2
Total volume [tons]	205,895	61,997	119,409	1	3	2
Value of goods Millions \$	\$481	\$145	\$279	1	3	2
# passenger vehicles & buses	247,558	74,542	143,571	1	3	2
			POE Scores	4	12	8
		Overa	II POE Result	1	3	2
Airports						
Total volume [tons]						
		Ai	rport Scores			
		Overall Air	rport Result			
Maritime Ports - NONE						
Total volume [millions tons]						
Total number TEUs						
		Maritim	e Port Score			
		Overall Mar	ritime Result			
Railroads Border Crossing at POE <sup>1</sup>						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Rai	Iroad Scores			
		Overall Rai	Iroad Result			
Total AADT in Three Corridors	Share of A	AADT Among	Corridors			
49,754	53.2%	16.0%	30.8%			
	_	_		_	_	_

lower Score represents greater need.

There were no rail crossings at New Mexico POE in calendar year 2000..
 OE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.
 Historical data from New Mexico BINS Technical Committee Representative, see Tables 6 - 9 for details.

Table 3
Corridor Data and Results For 2020

	Co	orridor Raw I	Data	Evalu	ation Res	ults
	Α	В	С	Α	В	С
	I-10	North- South	Midwest			
Highways						
Average Annual Daily Traffic	41,927	12,378	31,759	1	3	2
Highway Length [in Km.]	522.70	60.00	104.10	1	3	2
LOS [A=1 to F = 9]	1.816	1.000	1.040	1	3	2
Capacity at Peak Hour	13,869	6,120	12,344	1	3	2
		Н	ighway Scores	4	12	8
		Overall H	lighway Result	1	3	2
Land Port of Entry Border Crossing						
Number trucks	172,260	50,856	130,484	1	3	2
Total volume [tons]	2,583,898	762,837	1,957,265	1	3	2
Value of goods Millions \$	\$8,056	\$2,378	\$6,102	1	3	2
# passenger vehicles & buses	1,778,749	525,135	1,347,376	1	3	2
			POE Scores	4	12	8
		Ove	rall POE Result	1	3	2
Airports						
Total volume [tons]						
			Airport Scores			
		Overall	Airport Result			
Maritime Ports - None						
Total volume [million tons]						
Total number TEUs						
		Mariti	ime Port Score			
		Overall M	laritime Result			
Railroads Border Crossing at POE <sup>1</sup>						
Number rail cars	36,400	36,400	0	1	1	3
Total volume [tons]	946,400	946,400	0	1	1	3
Total Number TEUs	0	0	0	1	1	3
Value of goods Millions \$	\$4,004	\$4,004	\$0	1	1	3
	Railroad Scores				4	12
		Overall R	Railroad Result	1	1	3
Total AADT in Three Corridors	Share of	AADT Amon	g Corridors			
86,064	48.7%	14.4%	36.9%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution All forecasts are from the New Mexico BINS Technical Committee representative. See Tables 6-9

 $Lower \, Score \, represents \, greater \, need.$ 

The 2020 rail data projections represent crossings made by the Burlington Northern Santa Fe No data were provided on airports or railroads. [BNSF] railroad and the Union Pacific [UP] railroad. The 2020 data are divided equally between the two railroads. Since the BNSF operates in the North -South corridor and the UP operates in the I-10 corridor, these data are divided equally among these two corridors

Table 4
Corridor Changes and Results, 2000 - 2020

	С	orridor Raw	Data	Evalu	ation Re	sults
	Α	В	С	Α	В	С
	I-10	North- South	Midwest			
Highways						
Average Annual Daily Traffic	15,477	4,414	16,420	2	3	1
Highway Length [in Km.]	0.00	0.00	0.00	1	1	1
LOS [A=1 to F = 9]	0.446	0.000	-0.038	1	2	3
Capacity at Peak Hour	53	0	0	1	2	2
		Н	ighway Scores	5	8	7
		Overall H	ighway Result	1	3	2
Land Port of Entry Border Crossing						
Number trucks	135,025	38,506	143,246	2	3	1
Total volume [tons]	2,095,728	597,647	2,223,325	2	3	1
Value of goods Millions \$	\$6,663	\$1,900	\$7,069	2	3	1
# passenger vehicles & buses	1,357,847	387,222	1,440,519	2	3	1
			POE Scores	8	12	4
		Ove	rall POE Result	2	3	1
Airports						
Total volume [tons]						
			Airport Scores			
		Overall	Airport Result			
Maritime Ports - None						
Total volume [million tons]						
Total number TEUs						
		Mariti	ime Port Score			
		Overall M	aritime Result			
Railroads Border Crossing at POE						
Number rail cars	36,400	36,400	0	1	1	3
Total volume [tons]	946,400	946,400	0	1	1	3
Total Number TEUs	0	0	0	1	1	1
Value of goods Millions \$	\$4,004	\$4,004	\$0	1	1	3
		4	4	10		
-		Overall R	ailroad Result	1	1	3
Total AADT in Three Corridors	Share of	AADT Amo	ng Corridors			
36,310	42.6%	12.2%	45.2%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution Differences are estimated by subtracting the year 2000 data from the 2020 projections. See Tables 5-8

Lower Score represents greater need.

Table 5
Corridor Percent Changes and Results, 2000 - 2020

	Co	orridor Raw I	Data	Evalu	ation Res	sults
	Α	В	С	Α	В	С
	I-10	North- South	Midwest			
Highways						
Average Annual Daily Traffic	58.5%	55.4%	107.0%	2	3	1
Highway Length [in Km.]	0.0%	0.0%	0.0%	1	1	1
LOS [A=1 to F = 9]	32.5%	0.0%	-3.6%	1	2	3
Capacity at Peak Hour	0.4%	0.0%	0.0%	1	2	2
		Н	ighway Scores	5	8	7
		Overall H	ighway Result	1	3	2
Land Port of Entry Border Crossing						
Number trucks	860.2%	860.2%	860.2%	1	1	1
Total volume [tons]	1269.5%	1269.5%	1269.5%	1	1	1
Value of goods Millions \$	1728.3%	1728.3%	1728.3%	1	1	1
# passenger vehicles & buses	684.1%	684.1%	684.1%	1	1	1
			POE Scores	4	4	4
		Ove	rall POE Result	1	1	1
Airports						
Total volume [tons]						
			Airport Scores			
		Overall	Airport Result			
Maritime Ports - None						
Total volume [million tons]						
Total number TEUs						
		Mariti	ime Port Score			
		Overall M	aritime Result			
Railroads Border Crossing at POE						
Number rail cars	+%	+%	0.0%	1	1	3
Total volume [tons]	+%	+%	0.0%	1	1	3
Total Number TEUs	0.0%	0.0%	0.0%	1	1	1
Value of goods Millions \$	+%	+%	0.0%	1	1	3
			ailroad Scores	4	4	10
		Overall R	Railroad Result	1	1	3

See Tables 5-8

Lower Score represents greater need.

Table 6 Highway Data

		Summary	Dat	ta for t	he I-10	Corr	idor for	2000			
	I-10	US-180	I	NM-9	NM-1	1	NM-81	NM-1	136	NM-146	Total
AADT:	17,947	2,092		436	2,542	2	66	3,21	1	156	26,450
Highway Length:	164.20	163.00		87.70	34.10	)	45.80	8.8	0	19.10	522.70
LOS:	В	Α		Α	Α		Α	А		Α	Α
LOS #:	2.2	1.0		1.0	1.0		1.0	1.0	)	1.0	X
Weighted Average LOS:	0.7	0.3		0.2	0.1		0.1	0.0	)	0.0	1.4
Capacity:	6,216	1,600		500	800		500	3,20	00	1,000	13,816
		Summary	Dat	ta for t	he I-10	Corr	idor for				•
	I-10	US-180	<u> </u>	NM-9	NM-1	1	NM-81	NM-1	136	NM-146	Total
AADT:	29,820	3,021		528	3,551	1	75	4,74	<b>1</b> 5	187	41,927
Highway Length:	164.20	163.00	1	87.70	34.10	)	45.80	8.8	0	19.10	522.70
LOS:	С	Α		Α	Α		Α	Α	ı	Α	A
LOS #:	3.3	1.3		1.0	1.0		1.0	1.0	)	1.0	X
Weighted Average LOS:	1.0	0.4		0.2	0.1		0.1	0.0	)	0.0	1.8
Capacity:	6,269	1,600		500	800		500	3,20	00	1,000	13,869
		Summary	Da	ta for t	he Nor	th-Sc	outh Cor	ridor			
					Interst						
					ear 00		Year 2020				
		AAI	DT:		64		2,378				
	Hig	hway Leng	th:	60	.00	6	60.00				
		LC	OS:	1	4		A				
		LOS	#:		.0		1.0				
		Capaci	_		20		,120				
		Summa	ry [	Data for	r the M	idwe	est Corri	dor			
				ar Year				T		Year 2020	)
		US-54	l	JS-70	To	tal	US-	·54	US	S-70	Total
	AADT:	5,832	(	9,508	15,	340	19,2	281	12	,478	31,759
Highway I	_ength:	64.30	;	39.80	104	.10	64.	30	39	9.80	104.10
	LOS:			Α	/	4	<i>I</i>	4		Α	A
	LOS #:	1.0		1.2	,	K	1.	0	1	.1	X
Weighted A	verage LOS:	0.6		0.5	1.	.1	0.	6 0.4		).4	1.0
<b>Capacity:</b> 6,000 6,344 <b>12,344</b> 6,000										344	12,344
LOS coding: A = 1, E	3 = 2, C = 3	D = 4, E = 5, F	= 6								

Table 7
Land Port of Entry [POE] Crossing Data

	Antelope Wells	Columbus	Santa Teresa	Sunland Park	Total
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	
Northbound POE Crossing Data for	2000¹				
Number trucks	0	4,878	31,946	0	36,824
Tons of goods	0	61,341	325,959	0	387,300
Value [Millions \$] moved by truck	\$0.0	\$27.2	\$877.2	\$0.0	\$904.4
Number of passenger vehicles	1,453	387,298	76,866	0	465,617
Number of buses	14	0	41	0	55
Number passenger vehicles & buses	1,467	387,298	76,907	0	465,672
Number of rail cars	0	0	0	0	X
Volume of tons moved by rail	0	0	0	0	X
Number of TEUs moved by rail	0	0	0	0	X
Value [Millions \$] moved by rail	\$0.0	0	0	\$0.0	X
Northbound POE Crossing Data for	2020 <sup>1</sup>				
Number trucks	26,000	15,600	312,000	0	353,600
Tons of goods	390,000	234,000	4,680,000	0	5,304,000
Value [Millions \$] moved by truck	\$780.0	\$156.0	\$15,600.0	\$0.0	\$16,536.0
Number of passenger vehicles	109,500	1,095,000	912,500	1,460,000	3,577,000
Number of buses	1,460	0	72,800	0	74,260
Number passenger vehicles & buses	110,960	1,095,000	985,300	1,460,000	3,651,260
Number of rail cars	0	0	72,800	0	X
Volume of tons moved by rail	0	0	1,892,800	0	X
Number of TEUs moved by rail	0	0	0	0	X
Value [Millions \$] moved by rail	\$0.0	\$0.0	\$8,008.0	\$0.0	X
Per Cent Change in POE Data: 2000	to 2020				
Number trucks					860.2%
Tons of goods					1269.5%
Value [Millions \$] moved by truck					1728.3%
Number of passenger vehicles					X
Number of buses					X
Number passenger vehicles & buses					684.1%
Number of rail cars <sup>2</sup>					X
Volume of tons moved by rail <sup>2</sup>					Х
Number of TEUs moved by rail <sup>2</sup>					Х
Value [Millions \$] moved by rail <sup>2</sup>					X
Notes:					

Number of trucks = northbound trucks that cross the US-Mexico border

Tons of goods = carried by northbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by northbound trucks that cross the US-Mexico border.

Number of passenger vehicles = northbound passenger vehicles that cross the US-Mexico border.

Number of buses = northbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of northbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = northbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by the northbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are northbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by northbound rail cars that cross the US-Mexico border. The 2020 rail data projections represent crossings made by the Burlington Northern Santa Fe [BNSF] railroad and the Union Pacific [UP] railroad at the Santa Teresa POE. The 2020 data are divided equally between the two railroads. Since the BNSF operates in the North-South corridor and the UP operates in the I-10 corridor, these data are divided equally among these two corridors. Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- <sup>1</sup> From New Mexico BINS Technical Committee representative.
- <sup>2</sup> Growth rates are not calculated for rail data because there are no rail data for the base year.

Table 8
Airport Data

	Dona Ana	Las Cruces	Total
Within 100 km of the US-Mexico Border?	Υ	Υ	
Designated as an International POE?	Υ	Υ	
Historical Data for 2000			
Longest runway length	8,500	7,499	8,500
Tons of goods exported & imported			
Airport served by railroad facility?			Χ
If yes, name of railroad			Χ
On-land movement of air freight	Χ	X	Χ
Share of goods moved by truck			Χ
Share of goods moved by railroad			Χ
Projections for 2020			
Longest runway length	10,000	10,600	10,600
Date becomes operational	Jan 2008	2009	Χ
Tons of goods exported & imported			
Airport served by railroad facility?			Χ
If yes, name of railroad			Χ
On-land movement of air freight	Χ	Х	Х
Share of goods moved by truck			
Share of goods moved by railroad			
Per Cent Change: 2000 to 2020			
Longest runway length			
Tons of goods exported & imported			

Dona Ana County Airport receives very rarely receives shipments from out of country. Typical imported shipments are received through U.S. Customs at the El Paso International Airport.

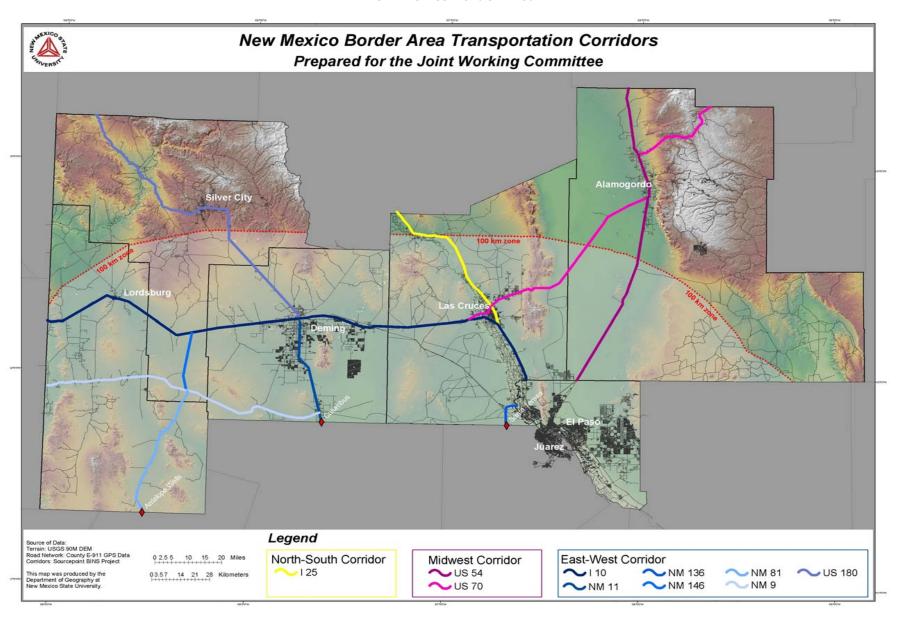
Las Cruces International Airport is designated as an international port of entry due to import/export shipments in past years. However, they no longer import/export shipments from the airport, but the "port of entry" designation remains

**Source:** New Mexico BINS Technical Committee representative

# Table 9 Maritime Port Data

There are **NO MARITIME PORTS** in New Mexico.

Map 1 New Mexico Border Area



### **NEW MEXICO HIGHWAY DATA**

# Methodology For Calculating Corridor Averages for Average Annual Daily Traffic [AADT], Level of Service [LOS], and Peak Hour Traffic Carrying Capacity

Corridor totals for highways are obtained for highway length, AADT, LOS and Peak Hour Traffic Carrying Capacity. The corridor total for each of these indicators is obtained by adding the data for each of the highways assigned to the corridor. The State BINS Technical Committee representative assigned the highways to the corridors. Each of the compilations for each of the indicators is now reviewed.

**Highway Length**—the length of each highway within the 100 km limit. The length is obtained for each highway by subtracting the beginning mile marker, from the last mile marker. If segments are omitted, those segments and their data are omitted from the highway total. The highway length for the entire corridor is obtained by summing the highway length for each highway in the corridor.

**Weighted Average**—an average in which each of the observations is multiplied [or "weighted"] by a factor before calculations. In addition, these weights sum to unity or one [1]. Weighted averages are used so that short and long segments of roadway are counted proportionately in calculating the average for the entire highway.

Average Annual Daily Traffic—the weighted average AADT for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the AADT for that segment to obtain the weighted AADT for the segment. Step 3: The weighted AADT for all the segments are summed to obtain the weighted average AADT for the highway. The weighted average AADT for all the highways in the corridor are then summed to obtain the Corridor Total AADT.

Level of Service—the weighted average LOS for each highway is calculated in the same manner as that used for AADT. A major difference is that LOS is provided in the letters A, B, C, D, E, F0, F1, F2 and F3. These letters are converted to numbers using the following system, A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, and F3=9. After the conversions the following steps are used to calculate LOS for each highway. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the LOS number for that segment to obtain the weighted LOS number for the segment. Step 3: The weighted LOS number for all the segments are summed to obtain the weighted average LOS for the highway. The weighted average LOS number for all the highways in the corridor are then summed to obtain the Corridor Total LOS.

**Peak Hour Traffic Carrying Capacity [PCAP]**—the weighted average PCAP for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the PCAP for that segment to obtain the weighted PCAP for the segment. Step 3: The weighted PCAP for all the segments are summed to obtain the weighted average PCAP for the highway. The weighted average PCAP for all the highways in the corridor are then summed to obtain the Corridor Total PCAP.

			Ta	able 10				
		Highway	Data Com	piled Into	Corridor	Form		
	Used	in Table 5	of Corrid	or Evalua	tion for N	ew Mexico	)	
Seç	gment Ler	ngth is the	Basis for	Estimatin	g the Wei	ghted Ave	rage for	
		T	AADT, LO	S and Cap	acity	1		
		Summary D	ata for the	Fact-Most	Corridor fo	or 2000		
		Janninai y D	ata for the	Last-WCSt	Corridor id	7 2000		
	I-10	US-180	NM-9	NM-11	NM-81	NM-136	NM-146	Total
AADT:	17,947	2,092	436	2,542	66	3,211	156	26,450
Highway Length:	164.2	163.0	87.7	34.1	45.8	8.8	19.1	522.7
LOS:	В	Α	Α	Α	Α	Α	Α	Α
LOS #:	2.2	1.0	1.0	1.0	1.0	1.0	1.0	
Weighted Average LOS:	0.7	0.3	0.2	0.1	0.1	0.0	0.0	1.4
Capacity:	6,216	1,600	500	800	500	3,200	1,000	13,816
	LOS codino	g: A = 1, B =	2. C = 3. D =	4. E = 5. F =	: 6			
		, , , , , ,	2,0 0,2	.,				
		Summary D	ata for the	East-West	Corridor fo	or 2020		
	I-10	US-180	NM-9	NM-11	NM-81	NM-136	NM-146	Total
AADT:	29,820	3,021	528	3,551	75	4,745	187	41,927
Highway Length:	164.2	163.0	87.7	34.1	45.8	8.8	19.1	522.7
LOS:	С	Α	Α	Α	Α	Α	Α	Α
LOS #:	3.3	1.3	1.0	1.0	1.0	1.0	1.0	
Weighted Average LOS:	1.0	0.4	0.2	0.1	0.1	0.0	0.0	1.8
Capacity:	6,269	1,600	500	800	500	3,200	1,000	13,869
	LOS codino	j: A = 1, B =	2, C = 3, D =	4, E = 5, F =	6			
		,, 2	,, -	., = -, .	-			
		t .	1	t .	t .	1	1	

	Hood			oiled Into Corrido			
Sen				or Evaluation for I Estimating the We			
Jeg	illelit Lei	igui is tile		and Capacity	igilieu Ave	rage roi	
			AADI, LOS	and capacity			
		Summar	y Data for t	he North-South Cor	ridor		
				terstate 25			
			Year	Year			
			2000	2020			
AADT:			7,964	12,378			
Highway							
Length:			60.0	60.0			
LOS:			A	A			
LOS #:			1.0	1.0			
Capacity:			6,120	6,120			
I	LOS coding	g: A = 1, B =	2, C = 3, D =	4, E = 5, F = 6			
		Summ	ary Data for	the Midwest Corri	dor		
	Cala	endar Year	2000		Colo	endar Year	2020
	Cale	nuar Year	2000		Cale	nuar Year	2020
	US-54	US-70	Total		US-54	US-70	Total
AADT:	5,832	9,508	15,340		19,281	12,478	31,759
Highway	· · · · · · · · · · · · · · · · · · ·				,		
Length:	64.3	39.8	104.1		64.3	39.8	104.1
LOS:	Α	Α	A		А	Α	A
LOS #:	1.0	1.2			1.0	1.1	
Weighted Average LOS:	0.6	0.5	1.1		0.6	0.4	1.0
Capacity:	6,000	6,344	12,344		6,000	6,344	12,344
oupdoity.	0,000	0,011	12,044		0,000	0,017	12,044
	LOS coding	g: A = 1, B =	2, C = 3, D =	4, E = 5, F = 6			

				Interstate 10	)					Un	ited States 1	80		
	Within 10	0 km of the	e US-Mexic	o Border?	Υ			Within 10	0 km of the	e US-Mexic	o Border?	Y		
		Internatio			Υ				Internatio			Υ		
Seg-	Begin	End		Avg Ann	l evel o	f Service	Peak Hr	Begin	End		Avg Ann	Levelo	f Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
	101110				•		Jupusity		10.110	1111100		-		oupuon.
1	0.000	49.800	49.800	13,924	В	2	6,000	0.000	109.000	109.000	1,317	Α	1	1,600
2	49.800	82.300	32.500	13,589	В	2	6,000	109.000	163.000	54.000	3,656	Α	1	1,600
3	82.300	134.700	52.400	16,359	В	2	6,000							
4	134.700	149.500	14.800	33,114	С	3	7,200							
5	149.500	164.200	14.700	31,597	С	3	7,200							
				400 500			22.422				4.000		_	
		Sum	164.200	108,583		12	32,400		Sum	163.000	4,973		2	3,200
Source:	New Mexi	co BINS Techr	nical Commit	tee representat	ive									
<b></b>	TTOTT ITTOXI	l l l l l l l l l l l l l l l l l l l		too roprosontat										
			Estimating	g the Weight	ed Averag	es for I-10	)		Е	stimating	the Weighte	d Average	s for US-1	80
		Segment	Weight	AADT	Level of	f Service	Capacity		Segment	Weight	AADT	Level o	f Service	Capacity
		Ŭ					<u> </u>							
		1	30.3%	4,223		0.607	1,820		1	66.9%	881		0.669	1,070
		2	19.8%	2,690		0.396	1,188		2	33.1%	1,211		0.331	530
		3	31.9%	5,221	_	0.638	1,915		3					
		4	9.0%	2,985		0.270	649		4					
		5	9.0%	2,829		0.269	645		5					
			1											

	) km of the Internation	e US-Mexic	Mexico Rou o Border?			11.			New	Mexico Rout	te 11	L.	
rves an Begin	Internatio		o Border?						INCAN	IVICATED ROU			-
rves an Begin	Internatio		o Boraer?		+		\\\':+ -: 40	0 1 6 41-	LIC BA	- DI2	V	<del> </del>	
Begin		nal POE?		Υ				0 km of the		o Border?	Υ		
				Υ			Serves an	Internation	nal POE?		Υ		-
	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Service	Peak Hr
	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
0.000	44.100	44.100	470	Λ	1	E00	0.000	2 100	2 100	2.072	Λ	1	800
					·							'	800
14.100	07.700	43.000	374	Α	l	300	3.100	34.100	31.000	2,307	^	<u>'</u>	000
													+
	Sum	87.700	872		2	1,000		Sum	34.100	5,382		2	1,600
	New Mexico	BINS Technic	al Committee re	epresentativ	e e							 	
												<u> </u>	
	E	stimating	the Weighte	ed Average	es for NM-	.9		Е	stimating	the Weighte	d Average:	s for NM-1	11
	Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
	_												
													73
		49.7%	196		0.497	249			90.9%	2,281		0.909	727
													-
	3							3					
	Sum	100.0%	436	Α	1.000	500		Sum	100.0%	2,542	Α	1.000	800
		Sum   Sum   Segment   1	Sum   87.700   43.600     Sum   87.700     New Mexico BINS Technic     Estimating     Segment   Weight     1	Sum   87.700   43.600   394	Sum   87.700   43.600   394   A	Sum   87.700   43.600   394   A   1	Sum   87.700   43.600   394   A   1   500	Sum   87.700   43.600   394   A   1   500   3.100	Sum   87.700   43.600   394   A   1   500   3.100   34.100	Sum   87.700   43.600   394   A   1   500   3.100   34.100   31.000	Sum   87.700   43.600   394   A   1   500   3.100   34.100   31.000   2,509	Sum   87.700   43.600   394   A   1   500   3.100   34.100   31.000   2,509   A	Sum   87.700   43.600   394   A   1   500   3.100   34.100   31.000   2,509   A   1

					The E	ast-West	Corridor:	Calendar	Year 2000	) Data				
			New	Mexico Rou	te 81					New	Mexico Rout	e 136		
	Within 10	00 km of the	e US-Mexic	o Border?	Υ			Within 10	00 km of the	uS-Mexic	o Border?	Υ		
		Internatio			Υ				Internatio			Υ		
Seg-	Begin	End		Avg Ann	Lovelo	f Service	Peak Hr	Begin	End		Avg Ann	Lovele	f Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
	0.000	45.000	45.000	, ,			500	0.000			0.011			0.000
1	0.000	45.800	45.800	66	Α	1	500	0.000 6.000	6.000 8.800	6.000 2.800	3,211 3,211	A	1	3,200 3,200
3								6.000	8.800	2.800	3,211	Α	I	3,200
4														
5														
		Comp	45.000	66			500		£:	0.000	<i>(</i> 422		2	6.400
		Sum	45.800	00		1	500		Sum	8.800	6,422		2	6,400
Source:		New Mexico	BINS Technic	cal Committee re	epresentative	9								
		Е	stimating	the Weighte	d Average	s for NM-8	81		Es	timating	the Weighted	d Average:	s for NM-1	36
		Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level o	f Service	Capacity
		- Jane		7.0.12			Сарасту		o go		7.2.2	201010		Jupany
		1	100.0%	66		1.000	500		1	68.2%	2,189		0.682	2,182
		2							2	31.8%	1,022		0.318	1,018
		3							3					
		4							4					
		5							5					
		Sum	100.0%	66	Α	1.000	500		Sum	100.0%	3,211	Α	1.000	3,200
Notes:		Notes:	LOS codina:	A = 1, B = 2, C	= 3 D = 4 F	= 5 F = 6								
		140103.	LOS County.	1, 0 - 2, 0	- J, D - +, L	- 5,1 - 0	1							

			1		The Ea	ast-West	Corridor:	Calendar	Year 2000	) Data				1
			New	Mexico Rout	e 146									
1	Within 10	0 km of the	e US-Mexic	o Border?	Υ			Within 10	0 km of the	e US-Mexic	o Border?			
;	Serves an	Internatio	nal POE?		Υ			Serves an	Internatio	nal POE?				
Seg-	Begin	End		Avg Ann	Level of	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
1	0.000	19.100	19.100	156	Α	1	1,000							
2														
3														
4														
5														
		Sum	19.100	156		1	1,000		Sum	0.000	-		0	-
Source:		New Mexico	BINS Technic	al Committee re	epresentative	9								
		Es	timating t	the Weighted	Averages	for NM-1	46							
		Segment	Weight	AADT	Level of	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
		1	100.0%	156		1.000	1,000		1					
		2							2					
		3							3					
		4							4					
		5							5					
			400.00	45.		4.000	4.000			0.00			0.000	
		Sum	100.0%	156	Α	1.000	1,000		Sum	0.0%	0		0.000	0
Notes:		Notes:	LOS coding:	A = 1, B = 2, C	= 3, D = 4, E	= 5, F = 6								1

				Interstate 10						Un	ited States 1	80		
	Within 10	0 km of the	e US-Mexic	o Border?	Υ			Within 10	00 km of the	e US-Mexic	o Border?	Υ		
		Internatio			Υ				Internatio			Υ		
Seg-	Begin	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level of	f Service	Peak H
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacit
1	0.000	49.800	49.800	23,687	С	3	6,000	0.000	109.000	109.000	1,840	A	1	1,600
2	49.800	82.300	32.500	23,359	C	3	6,000	109.000	163.000	54.000	5,404	В	2	1,600
3	82.300	134.700	52.400	27,827	C	3	6,000	1071000		01.000	37.3.		_	.,000
4	134.700	149.500	14.800	47,936	D	4	6,000							
5	149.500	164.200	14.700	53,749	E	5	9,000							
		Sum	164.200	176,558		18	33,000		Sum	163.000	7,244		3	3,20
ource:	New Mexi	ico BINS Techi	nical Commit	tee representati	ve									
			Fstimatin	g the Weight	ed Averac	nes for I-10	)		F	stimating	the Weighted	1 Average	s for US-1	RO
		Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	f Service	Capacity
		1	30.3%	7,184		0.910	1,820		1	66.9%	1,230		0.669	1,070
	l	2	19.8%	4,623		0.594	1,188		2	33.1%	1,790		0.663	530
			31.9%	8,880		0.957	1,915		3					
		3		4 221		0.361	541		4					
		3 4	9.0%	4,321					5					
			9.0% 9.0%	4,812		0.448	806		3					
		4		·	С	0.448 <b>3.269</b>	806 <b>6,269</b>		Sum	100.0%	3,021	A	1.331	1,

Seg- B ment I	thin 100 km of rves an International Begin End Post Post Mile Mile 0.000 44.10	tional	S-Mexic	Mexico Rou  o Border?  Avg Ann  Daily	te 9 Y Y Level o				0 km of the	e US-Mexic	Mexico Rout o Border?	e 11 Y		
Seg- B ment I	Begin End Post Pos Mile Mile	tional	S-Mexico POE? ength	o Border?  Avg Ann	Y Y					e US-Mexic				
Seg- B ment I	Begin End Post Pos Mile Mile	tional	POE?	Avg Ann	Υ						o Border?	Υ		
Seg- B ment I	Begin End Post Pos Mile Mile	: Le	ength					Comuso on						
ment I	Post Pos Mile Mile	Le	_		Level o			serves an	Internation	nal POE?		Υ		
ment I	Post Pos Mile Mile	Le	_		_0.0.0	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Service	Peak Hr
			_	Dairy	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
1 (	0.000 44.10		viiles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
	0.000	0 4/	4.100	582	A	1	500	0.000	3.100	3.100	4,009	Α	1	800
	14.100 87.70		3.600	474	A	1	500	3.100	34.100	31.000	3,505	A	1	800
3	77.70		0.000	.,.		•	000	0.100	011100	01.000	0,000		•	
4														
5														
	S	um 87	7.700	1,056		2	1,000		Sum	34.100	7,514		2	1,600
Source:	New Me	xico BINS	S Technica	al Committee re	presentativ	e								
		Fstir	mating	the Weighte	d Averag	es for NM-	9		F	stimating	the Weighted	l Average	s for NM-1	1
			Ĭ							Ĭ				
	Segme	ent W	eight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
	1	50	0.3%	293		0.503	251		1	9.1%	364		0.091	73
	2		9.7%	236		0.497	249		2	90.9%	3,186		0.909	727
	3								3					
	4								4					
	5								5					
	Sun	10	00.0%	528	Α	1.000	500		Sum	100.0%	3,551	Α	1.000	800
lotes:	Notes:	LOS	coding	A = 1, B = 2, C =	= 3 D = 4 F	= 5 F = 6								

Seg- Bement P	thin 100 km of the rves an Internation  Begin End Post Post Mile Mile  0.000 45.800	e US-Mexic	Mexico Rout to Border?  Avg Ann Daily Traffic	Y Y	f Service	Peak Hr		00 km of the	e US-Mexic	Mexico Rout	e 136 Y Y		
Service   Seg-   Be   ment   P	Begin End Post Post Mile Mile	e US-Mexic nal POE? Length Miles	o Border?  Avg Ann Daily	Y Y Level o		Peak Hr			e US-Mexic		Υ		
Service   Seg-   Be   ment   P	Begin End Post Post Mile Mile	Length Miles	Avg Ann Daily	Y Level o		Peak Hr				o Border?			
Seg- Bement P W N N N N N N N N N N N N N N N N N N	Begin End Post Post Mile Mile	Length Miles	Daily	Level o		Peak Hr	Serves an	Internation	nal POE?		Υ		
ment P. W. 1 0. 2 3 4	Post Post Mile Mile	Miles	Daily	A to		Peak Hr						+	+
ment P. W. 1 0. 2 3 4	Post Post Mile Mile	Miles	Daily	A to			Begin	End		Avg Ann	Level o	f Service	Peak Hr
1 0. 2 3 4		Miles	•	г	1 (0	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
2 3 4	0.000 45.800	45.800		r	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
2 3 4	10.000	10.000	75	Α	1	500	0.000	6.000	6.000	4,745	Α	1	3,200
3 4			7.5		1	300	6.000	8.800	2.800	4,745	A	1	3,200
4							0.000	0.000	2.000	.,,,,,,		<u> </u>	- 0,200
5													+
													-
	Sum	45.800	75		1	500		Sum	8.800	9,490		2	6,400
Source:	New Mexico	BINS Technic	al Committee re	epresentative	e e								
	F	stimating	the Weighted	d Average	s for NM-	R1		F	timating t	the Weighted	1 Average	s for NM-1	36
				Ĭ									
	Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	f Service	Capacity
	1	100.0%	75		1.000	500		1	68.2%	3,235		0.682	2,182
	2							2	31.8%	1,510		0.318	1,018
	3							3					
	4							4					
	5							5					
	Sum	100.0%	75	Α	1.000	500		Sum	100.0%	4,745	Α	1.000	3,200
lotes:	Notes:	IOS codina:	A = 1, B = 2, C =	- 3 D - 4 E	_ 5 F _ 6								

					The Ea	ast-West	Corridor:	Calendar	Year 2020	) Data				
			Nava	Mexico Rout	- 11/									
			ivew	iviexico Rout	e 146									
	Within 10	00 km of the	e US-Mexic	o Border?	Υ			Within 10	00 km of the	e US-Mexic	o Border?			
		Internatio			Υ				Internatio					
Seg-	Begin	End		Avg Ann	Lovelor	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Comulas	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
1	0.000	19.100	19.100	187	Α	1	1,000							
2														
4														
5														
		Sum	19.100	187		1	1,000		Sum	0.000	-		0	-
Source:		New Mexico	BINS Technic	cal Committee r	epresentative	e e								
		F	stimating t	the Weighted	d Averages	for NM-1	16							
							10							
		Segment	Weight	AADT	Level of	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
		1	100.0%	187		1.000	1,000		1					
		2					,		2					
		3							3					
	-	4							4				-	
		5							5					
		Sum	100.0%	187	Α	1.000	1,000		Sum	0.0%	0		0.000	0
Notes:		Notes:	IOS codina:	Λ = 1 D = 2 C	- 2 D - 4 F	_ 5 E _ 4								
iotes:		Notes:	LOS COUING:	A = 1, B = 2, C	= 3, D = 4, E	= ɔ, r = o								

					The	North-So	uth Cor	ridor					
	In	terstate 2	25: Calenda	ar Year 20	000			Int	terstate 2	5: Project	ions to 2	020	
Within 1	00 km of	the US-M	lexico Bord	Υ			Within 1	l00 km of	the US-N	lexico Bor	Υ		
Serves a	n Interna	tional PO	E?	Υ			Serves a	n Interna	tional PC	E?	Υ		
Begin	End Post	Length				Peak Hr	Begin	End Post	Length				Peak Hr
Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
0.000	6.000	6.000	18,218	Α	1	7,200	0.000	6.000	6.000	19,281	Α	1	7,200
6.000	60.000	54.000	6,825	Α	1	6,000	6.000	60.000	54.000	11,611	Α	1	6,000
	Sum	60.000	25,043		2	13,200		Sum	60.000	30,892		2	13,200
New Me	exico BINS T	echnical Co	mmittee repre	esentative									
	Es	timating	the Weight	ted Avera	ges for I	-25		Est	timating	the Weigh	ted Aver	ages for	I-25
	Segment	Weight	AADT	Level of	Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
	1	10.0%	1,822		0.100	720		1	10.0%	1,928		0.100	720
	2	90.0%	6,143		0.900	5,400		2	90.0%	10,450		0.900	5,400
		100.0%	7,964	Α	1.000	6,120		Sum	100.0%	12,378	Α	1.000	6,120
	Begin Post Mile 0.000 6.000	Within 100 km of Serves an Interna  Begin End Post Post Mile Mile  0.000 6.000 6.000 60.000 Sum  New Mexico BINS T Es  Segment	Within 100 km of the US-M Serves an International PO  Begin End Post Post Length Mile Mile Miles  0.000 6.000 6.000 6.000 54.000  Sum 60.000  New Mexico BINS Technical Communications Estimating  Segment Weight	Within 100 km of the US-Mexico Bord Serves an International POE?  Begin End Avg Ann Post Post Length Daily Mile Mile Miles Traffic  0.000 6.000 6.000 18,218 6.000 60.000 54.000 6,825  Sum 60.000 25,043  New Mexico BINS Technical Committee representations of the Weight Segment Weight AADT	Within 100 km of the US-Mexico Bord Serves an International POE?  Begin End Avg Ann Level of Post Post Length Daily A to Mile Mile Miles Traffic F  0.000 6.000 6.000 18,218 A 6.000 60.000 54.000 6,825 A  Sum 60.000 25,043  New Mexico BINS Technical Committee representative  Estimating the Weighted Avera  Segment Weight AADT Level of	Interstate 25: Calendar Year 2000  Within 100 km of the US-Mexico Bord Y Serves an International POE?  Begin End Avg Ann Level of Service Post Post Length Daily A to 1 to Mile Mile Miles Traffic F 6  0.000 6.000 6.000 18,218 A 1 6.000 60.000 54.000 6,825 A 1  Sum 60.000 25,043 2  New Mexico BINS Technical Committee representative  Estimating the Weighted Averages for I  Segment Weight AADT Level of Service	Interstate 25: Calendar Year 2000	Interstate 25: Calendar Year 2000	Within 100 km of the US-Mexico Bord Y Serves an International POE?         Y         Within 100 km of Serves an International POE?           Begin End Post Post Post Mile Mile Mile Mile Mile Mile Mile Mile	Interstate 25: Calendar Year 2000			

					The M	lidwest (	Corridor: (	Calendar	Year 2000	Data				
			Ur	nited States 5	54					Uı	nited States	70		
	Within 10	0 km of the	e US-Mexic	o Border?	Υ			Within 10	0 km of the	e US-Mexic	o Border?	Υ		
		Internatio		0 201 001 1	Y				Internatio			Y		
Seg-	Begin	End		Avg Ann	Level of	Sorvice	Peak Hr	Begin	End		Avg Ann	Level of	Sorvice	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
		131110			-				131110					- Cupacity
1	0.000	64.300	64.300	5,832	Α	1	6,000	150.700	151.700	1.000	22,947	С	3	7,200
2								151.700	154.700	3.000	28,859	С	3	7,200
3								154.700	154.900	0.200	22,176	В	2	7,200
4								154.900	162.100	7.200	12,166	Α	1	7,200
5								162.100	190.500	28.400	6,227	Α	1	6,000
		Sum	64.300	5,832		1	6,000		Sum	39.800	92,375		10	34,800
Source:		New Mexico	BINS Technic	al Committee re	presentative									
			otime otim a	the Weighte	d Averene	o for UC E				otim otim m	the Weighte	d Avorono	o for US 7	0
			sumating	the weighte	u Average	S 101 US-5	14			sumating	the weighte	d Average	S 101 US-7	<u> </u>
		Segment	Weight	AADT	Level of	Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
		1	100.0%	5,832		1.000	6,000		1	2.5%	577		0.075	181
		2	100.070	0,002		1.000	3,000		2	7.5%	2,175		0.226	543
		3					1		3	0.5%	111		0.010	36
		4					1		4	18.1%	2,201		0.181	1,303
		5							5	71.4%	4,443		0.714	4,281
		Sum	100.0%	5,832	Α	1.000	6,000		Sum	100.0%	9,508	Α	1.206	6,344
Notes:	LOS codi	ng: A = 1, B =	2, C = 3, D =	4, E = 5, F = 6			1							

					The N	/lidwest (	Corridor:	Calendar	Year 2020	Data				
			Ur	nited States 5	54					Uı	nited States 7	70		
		00 km of the		o Border?	Y				0 km of the		o Border?	Y		
	serves ar	Internatio	IIai PUE?		T			Serves ar	Internatio	IIai PUE?		T		
Seg-	Begin	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level of	f Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	Mile	Mile	Miles	Traffic	F	6	Capacity	Mile	Mile	Miles	Traffic	F	6	Capacity
1	0.000	64.300	64.300	19,281	Α	1	6,000	150.700	151.700	1.000	30,118	В	2	7,200
2								151.700	154.700	3.000	37,879	В	2	7,200
3								154.700	154.900	0.200	29,106	В	2	7,200
4								154.900	162.100	7.200	11,905	Α	1	7,200
5								162.100	190.500	28.400	9,202	Α	1	6,000
		Sum	64.300	19,281		1	6,000		Sum	39.800	118,210		8	34,800
Source:		New Mexico	BINS Technic	al Committee re	presentative	e								
		E	stimating	the Weighte	d Average	es for US-5	54		I	Estimating	the Weighte	d Average	es for US-7	0
		Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	f Service	Capacity
		1	100.0%	19,281		1.000	6,000		1	2.5%	757		0.050	181
		2	0.0%	0		0.000	0		2	7.5%	2,855		0.151	543
		3	0.070	Ŭ		0.000			3	0.5%	146		0.010	36
		4							4	18.1%	2,154		0.181	1,303
		5							5	71.4%	6,566		0.714	4,281
		6							_		-1			.,==.
		Sum	100.0%	19,281	Α	1.000	6,000		Sum	100.0%	12,478	Α	1.106	6,344
Notes:		Notes:	LOS coding:	A = 1, B = 2, C	= 3, D = 4, E	= 5, F = 6								

	Level	of Service Lo	ok Up Table						
	LOS	Number							
	Α	1							
	В	2							
	С	3							
	D	4							
	E	5							
	F	6							
Note:	This table has two	purposes:							
	1. The first purpos	se is to assign num	bers to LOS letters.						
			and is in the form o	of a					
		A, B, C, etc. These							
		umbers using the f	following scheme:						
	A=1, B=2, C=3,	D=4, E=5, F=6							
	2. The second of the second								
		pose is to convert	average LOS s after the weighte						
			ay and for a corrid						
	The letters associated with the ranges are the following:  A = 1.000 to 1.999								
	B = 2.000 to 2.999								
	C = 3.000 to 3.999								
	D = 4.000 to 4	.999							
	E = 5.000 to 5.	999							
	F = 6.000 to 6.	999							

# CORRIDOR EVALUATION NUEVO LEON RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

#### GENERAL DESCRIPTION OF NUEVO LEON'S CORRIDORS

#### **Corridors**

Nuevo León has identified one corridor for the study and it is called Monterrey-Colombia.

# **Highways**

The Monterrey-Colombia corridor is composed of one highway and it is NL-01. This highway runs South-North.

# **Land Ports of Entry [POE]**

There is one POE in Nuevo León: Puente Internacional "Solidaridad" and it is directly connected to highway NL-01. In calendar year 2000, about 560,000 trucks and 130,000 passenger vehicles transited the Mexico-US border in Nuevo León moving south through the Puente Internacional "Solidaridad" POE.

#### **Airports**

Nuevo León has no airports that meet the minimum criteria [designated as an international POE AND located within the 100 km of the Mexico-US border].

### Railroads

There is one railroad that operates in the Monterrey-Colombia corridor and it is the Transportación Ferroviaria Mexicana [TFM]. The TFM rail line crosses the Mexico-US border in Tamaulipas, therefore, there are no rail crossing data for Nuevo León.

#### **Maritime Ports**

Nuevo León has no maritime ports and no plans to construct a maritime port between now and 2020.

Source: Nuevo León BINS Technical Committee representative. .

#### **ANALYSIS OF CORRIDOR EVALUATION RESULTS**

There is only one corridor identified in Nuevo León and it is called Monterrey-Colombia. Because there is only one corridor, there are no corridor comparisons

#### **Historical Data**

This discussion reviews highway and land POE data and results. With regard to the highways in 2000, the Monterrey-Colombia corridor averaged about 778 vehicles per day over its 118 kilometer [km] length with an average Level of Service of C.

The 560,000 trucks that crossed the Mexico-US border in 2000 in Nuevo León transported about 3.4 million tons of goods valued at about \$12 billion.

There are no maritime ports in Nuevo León; no airports that meet the minimum criteria [being within 100 km of the Mexico-US border and being designated as an international POE]; and no rail lines that cross the Mexico-US border in Nuevo León.

# **Change Data**

This discussion reviews highway and land POE data for both absolute changes and percent changes. With regard to absolute changes in highway data, average annual daily traffic [AADT] on the Monterrey-Colombia corridor increases 913 between calendar year 2000 and 2020 while the highway length of NL-01 remains constant. The corridor's Level of Service decreases from a C [3.619] to an F [5.619] between calendar year 2000 and 2020.

Truck crossings at land POE are projected to increase by about 450,000 between 2000 and 2020 while passenger vehicles crossing at the land POE are projected to increase by about 151,000.

With regard to percent changes between 2000 and 2020, highway AADT is projected to grow about 117%; the number of truck crossing the land POE is projected to increase by about 80% and passenger vehicle crossings are projected to increase by about 117%.

Table 1
Summary Corridor Results

	Corridor Scores <sup>1</sup>			Evaluation Results		
CANAMEX	Α	В	С	Α	В	С
Historical Data for 2000 <sup>2</sup>						
Highways	6			1		
Land Ports of Entry	6			1		
Airports						
Maritime Ports <sup>3</sup>						
Railroads						
Sum of Historical Scores:	12			1		
Changes Between 2000 and 2020⁴						
Highways	6			1		
Land Ports of Entry	6			1		
Airports						
Maritime Ports <sup>3</sup>						
Railroads						
Sum of Change Scores:	12			1		
Overall Scores <sup>5</sup> :	24					
Overall Result:	1					

- <sup>1</sup> The Corridor Scores are from the results in Tables 2, 4 and 5.
- <sup>2</sup> Historical results from Table 2. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- <sup>3</sup> Nuevo León has no airports that meet the minimum criteria.
- <sup>4</sup> Nuevo León has no maritime ports.
- <sup>5</sup> There are no rail data because the railroad that operates within 100 km of the Mexico-US bord er in Nuevo León does not have a rail line that crosses the Mexico-US border in Nuevo León.
- <sup>6</sup> The Changes Scores is the sum of the corridor results from the Corridor Changes [Table 4] and the corridor results from the Corridor Percent Changes [Table 5].
- The Overall Score is the sum of the Historical Score and the Changes Score. The Historical Data scores and the Changes Between 2000 and 2020 scores are equally weighted.

Lower score represents greater need.

Table 2
Corridor Data and Results For 2000

		Corridor Raw Data				ion s
	Monterrey- Colombia	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	778			1		
Highway Length [in miles]	118.0			1		
LOS [A=1 to F3 = 9]	3.619			1		
Capacity at Peak Hour						
		Highway Scores		3		
		Overall Highway	Result	1		
Land Port of Entry Border Crossing						
Number trucks	561,035			1		
Total volume [tons]	3,379,785			1		
Value of goods Millions \$						
# passenger vehicles & buses	130,664			1		
		POE Scores	•	3		
		Overall POE Resu	lt	1		
Airports						
Total volume [tons]						
		Airport Scores	•			
		Overall Airport Re	esult			
Maritime Ports - NONE						
Total volume [tons]						
Total number TEUs						
		Maritime Port Sco	ore			
		Overall Maritime	Result			
Railroads Border Crossing at POE						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Railroad Scores	•			
		Overall Railroad	Result			
Total AADT in One Corridor	Share o	f AADT Among Cor	ridors			
778	100.0%	0.0%	0.0%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution. Historical data from Nuevo León BINS Technical Committee Representative, see Tables 6 - 9 for details.

Table 3 **Corridor Data and Results For 2020** 

	C	Corridor Raw Data				ion is
	Monterrey- Colombia	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	1,691			1		
Highway Length [in miles]	118.0			1		
LOS [A=1 to F3 = 9]	5.619			1		
Capacity at Peak Hour						
		Highway Scores		3		
		Overall Highway R	esult	1		
Land Port of Entry Border Crossing						
Number trucks	1,013,285			1		
Total volume [tons]	6,104,230			1		
Value of goods Millions \$						
# passenger vehicles & buses	284,272			1		
		POE Scores		3		
		Overall POE Resul	t	1		
Airports						
Total volume [tons]						
		Airport Scores				
		Overall Airport Re	sult			
Maritime Ports - NONE						
Total volume [tons]						
Total number TEUs						
		Maritime Port Sco	re			
		Overall Maritime	Result			
Railroads Border Crossing at POE						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Railroad Scores				
		Overall Railroad R	esult			
Total AADT in One Corridor	Share of	AADT Among Corri	dors			
1,691	100.0%	0.0%	0.0%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.
Forecasts for highway data are from Nuevo León BINS Technical Committee representative. Forecasts for POE data from the Mexican SCT and highway segment data nearest the Mexico-US border. See Tables 6 and 8 for details

Table 4
Corridor Changes and Results, 2000 - 2020

	С	Corridor Raw Data				ion s
	Monterrey- Colombia	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	914			1		
Highway Length [in miles]	0.0			1		
LOS [A=1 to F3 = 9]	2.000			1		
Capacity at Peak Hour						
		Highway Scores	s	3		
		Overall Highwa	y Result	1		
Land Port of Entry Border Crossing						
Number trucks	452,250			1		
Total volume [tons]	2,724,445			1		
Value of goods Millions \$						
# passenger vehicles & buses	153,608			1		
		POE Scores		3		
		Overall POE Result		1		
Airports						
Total volume [tons]						
		Airport Scores				
		Overall Airport	Result			
Maritime Ports						
Total volume [tons]						
Total number TEUs						
		Maritime Port	Score			
		Overall Maritin	ne Result			
Railroads Border Crossing at POE						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Railroad Scores	5			
		Overall Railroa	d Result			
Total AADT in One Corridor	Share of	AADT Among Co	orridors			
914	100.0%	0.0%	0.0%			

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution. Differences are estimated by subtracting the year 2000 data from the 2020 projections.

See Tables 6 - 9 for details.

Table 5
Corridor Percent Changes and Results, 2000 - 2020

	Corridor Raw Data				Evaluatior Results		
	Monterrey- Colombia	В	С	Α	В	С	
Highways							
Average Annual Daily Traffic	117.5%			1			
Highway Length [in miles]	0.0%			1			
LOS [A=1 to F3 = 9]	55.3%			1			
Capacity at Peak Hour							
		Highway Scores		3			
		Overall Highway Resul	t	1			
Land Port of Entry Border Crossing							
Number trucks	80.6%			1			
Total volume [tons]	80.6%			1			
Value of goods Millions \$							
# passenger vehicles & buses	117.6%			1			
		POE Scores		3			
		Overall POE Result		1			
Airports							
Total volume [tons]							
		Airport Scores					
		Overall Airport Result					
Maritime Ports							
Total volume [tons]							
Total number TEUs							
		Maritime Port Score					
		Overall Maritime Resu	lt				
Railroads Border Crossing at POE							
Number rail cars							
Total volume [tons]							
Total Number TEUs							
Value of goods Millions \$							
-		Railroad Scores					
		Overall Railroad Resul	t				

See Tables 6 – 9 for details.

Table 6
Highway Data For the For the Monterrey-Colombia Corridor [Corridor A]

Highway	Year	Year	Change	, 2000 to 2020
Factors	2000	2020	Data	Per Cent
AADT	778	1,691	914	117.5%
Highway Length	118.000	118.000	0.000	0.0%
LOS [A to F]	С	E		
LOS#	3.619	5.619	2.000	55.3%
Capacity				

All data are from NL-01

Weighted Averages calculations are shown on next page.

LOS is the Level of Service

AADT is Average Annual Daily Traffic

LOS coding: A = 1, B = 2, C = 3, D = 4, E = 5, F0 = 6, F1 = 7, F2 = 8, F3 = 9

**Source:** Nuevo León BINS Technical Committee representative

Table 7 Land Ports of Entry [POE] Crossing Data

	Puente Solidaridad	Total
Federal inspection facilities at POE?	Yes	
Southbound POE Crossing Data for 2000 <sup>1</sup>		
Number trucks	561,035	561,035
Tons of goods	3,379,785	3,379,785
Value [Millions \$] moved by truck	\$12,046.3	\$12,046.3
Number of passenger vehicles	130,364	130,364
Number of buses	300	300
Number passenger vehicles & buses	130,664	130,664
Number of rail cars		
Volume of tons moved by rail		
Number of TEUs moved by rail		
Value [Millions \$] moved by rail		
Southbound POE Crossing Data for 2020 <sup>2</sup>		
Number trucks		1,013,285
Tons of goods		6,104,230
Value [Millions \$] moved by truck		
Number of passenger vehicles		
Number of buses		
Number passenger vehicles & buses		284,272
Number of rail cars		
Volume of tons moved by rail		
Number of TEUs moved by rail		
Value [Millions \$] moved by rail		
Per Cent Change in POE Data: 2000 to 2020	)	
Number trucks <sup>3</sup>		80.6%
Tons of goods <sup>3</sup>		
Value [Millions \$] moved by truck		
Number of passenger vehicles		
Number of buses		
Numb. passenger vehicles & buses <sup>3</sup>		117.6%
Number of rail cars		
Volume of tons moved by rail		
Number of TEUs moved by rail		
Value [Millions \$] moved by rail		
Notes		

Number of trucks = southbound trucks that cross the Mexico-US border

Tons of goods = carried by southbound trucks that cross the Mexico-US border.

Value [Millions \$] moved by truck = value of goods moved by southbound trucks that cross the Mexico-US border.

Number of passenger vehicles = southbound passenger vehicles that cross the Mexico-US border.

Number of buses = southbound buses that cross the Mexico-US border.

Number passenger vehicles & buses = sum of southbound passenger vehicles & buses that cross the Mexico-US border.

Number of rail cars = southbound rail cars that cross the Mexico-US border.

Volume of tons moved by rail = transported by the southbound rail cars that cross the Mexico-US border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are southbound and cross the Mexico-US border.

Value [Millions \$] moved by rail = value of goods transported by southbound rail cars that cross the Mexico-US border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- The 2000 southbound POE crossing data are derived from the Laredo Columbia northbound crossing data provided by the Texas BINS Technical Committee representative. The southbound data specified above are the same numbers as the northbound data specified on the Texas BINS Questionnaire [Part 2].
- <sup>2</sup> The actual values for 2020 are obtained by multiplying the historical data by the growth rate.
- The 80.6% growth rate for truck data is based on a compound annual growth rate of 3.0% the level specified by the Mexican Secretariat of Communications and Transportation.
- The growth rate for passenger vehicles and buses is the same as that observed for the change in Average Annual Daily Traffic [AADT] in the highway segment nearest the Mexico-US border. These AADT are obtained from the NL-01, Segment 4 of the data provided by the Nuevo Leon BINS Technical representative.

NL-01 Segment 4 AADT in 2000: 877 1,031
NL-01 Segment 4 AADT in 2020: 1,908 117.6%
The 117.6% is used to forecast the number of border crossings for passenger vehicles and buses in

The 117.6% is used to forecast the number of border crossings for passenger vehicles and buses in 2020.

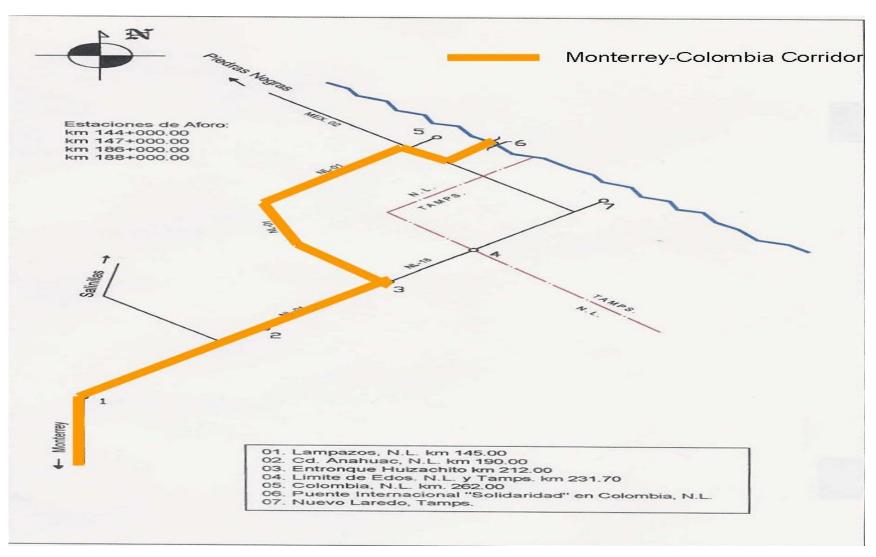
## Table 8 Airport Data

There are NO AIRPORTS in Nuevo León that meet minimum criteria.

## Table 9 Maritime Port Data

There are **NO MARITIME PORTS** in Nuevo León.

Map 1 Monterrey-Colombia Corridor



# CORRIDOR EVALUATION SONORA RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

## GENERAL DESCRIPTION OF SONORA'S CORRIDORS

### **Corridors**

Sonora has identified one corridor for the study and it is called the Sonora Corridor.

## **Highways**

The Sonora corridor is composed of five highways and they are the following:

- 1. MX-2, runs east-west.
- 2. MX-8, runs south-north.
- 3. MX-15, runs south-north.
- 4. MX-15D, runs south-north.
- 5. MX-17, runs south-north

No data on Level of Service [LOS] or capacity is provided. Therefore, the level of current or future congestion on highways in Sonora cannot be established.

## **Land Ports of Entry [POE]**

There is a rail crossing, a pedestrian crossing, and seven POEs serving vehicles in Sonora. The names of the seven POEs that serve vehicles are the following:

1. The San Luis Rio Colorado POE [directly connected to the MX-2].

- 2. The San Luis Rio Colorado POE [directly connected to the MX-2].
- 3. The Sasabe I POE.
- 4. The Nogales-Deconcini POE [directly connected to the MX-15 and MX-15D].
- 5. The Nogales III-Mariposa POE [directly connected to the MX -15 and MX -15D].
- The Naco POE.
- 7. The Agua Prieta POE [directly connected to MX-2 and MX-17].

In calendar year 2000, about 345,000 trucks and 10 million passenger vehicles and buses transited the Mexico-US border into Sonora moving through these POEs.

## **Airports**

Sonora DID NOT provide any airport data

## Railroads

There is a rail crossing at the Nogales POE, however, Sonora DID NOT provide any rail data.

## **Maritime Ports**

Sonora DID NOT provide any maritime port data

Source: The Sonora BINS Technical Committee representative provided no data for the BINS study. SourcePoint specified the Sonora Corridor, identified the highways within the corridor and compiled the highway data from the Mexican Secretariat of Communication & Transportation. See Table 6 for details. SourcePoint compiled Sonora land POE data by using POE data submitted by the Arizona BINS Technical Committee representative. See Table 6 for details.

## **ANALYSIS OF CORRIDOR EVALUATION RESULTS**

There is only one corridor identified in Sonora and it is called the Sonora Corridor. Because there is only one corridor, there are no corridor comparisons

## **Historical Data**

This discussion reviews highway and land POE data and results. With regard to the highways in 2000, the Sonora corridor averaged 14,474 vehicles per day over its 687 kilometer [km] length.

There were about 345,000 trucks and 10 passenger vehicles and buses that crossed the Mexico-US border in to Sonora during calendar year 2000.

No data on Level of Service [LOS] or capacity is provided. Therefore, the level of current or future congestion on Sonora highways cannot be established.

The Sonora BINS Technical Committee representative did not provide any data and DID NOT specify any airports, maritime ports, or railroads.

## **Change Data**

This discussion reviews highway and land POE data for both absolute changes and percent changes. With regard to absolute changes in highway data, average annual daily traffic [AADT] on the Sonora corridor increases about 11,000 between calendar year 2000 and 2020 while the highway length of all the five highways remains constant.

Truck crossings at land POEs are projected to increase by about 278,000 between 2000 and 2020, while passenger vehicles crossing at the land POEs are projected to increase by about 8 million.

With regard to percent changes between 2000 and 2020, highway AADT is projected to grow about 80 percent; the number of trucks, passenger vehicles and buses crossing the land POEs is also projected to increase by about 80 percent.

Table 1
Summary Corridor Results

	Corridor Scores <sup>1</sup>			<b>Evaluation Results</b>		
	Α	В	С	Α	В	С
Historical Data for 2000 <sup>2</sup>						
Highways	4			1		
Land Ports of Entry	4			1		
Airports <sup>3</sup>						
Maritime Ports <sup>4</sup>						
Railroads <sup>5</sup>						
Sum of Historical Scores:	8			1		
Changes Between 2000 and 2020 <sup>6</sup>						
Highways	4			1		
Land Ports of Entry	4			1		
Airports <sup>3</sup>						
Maritime Ports⁴						
Railroads <sup>5</sup>						
Sum of Change Scores:	8			1		
Overall Scores <sup>7</sup> :	16					
Overall Result:	1					

- <sup>1</sup> The Corridor Scores are from the results in Tables 2, 4 and 5.
- Historical results from Table 2. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- Sonora did not specify any airports or provide any airport data.
- Sonora did not specify any maritime ports or provide any maritime port data.
- Sonora did not specify any railroads or provide any railroad crossing data.
- The Changes Scores is the sum of the corridor results from the Corridor Changes [Table 4] and the corridor results from the Corridor Percent Changes [Table 5].
- The Overall Score is the sum of the Historical Score and the Changes Score. The Historical Data scores and the Changes Between 2000 and 2020 scores are equally weighted.

Table 2 **Corridor Data and Results For 2000** 

	Corridor Raw Data			Evaluation Results		
	Sonora	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	11,520			1		
Highway Length [in miles]	784			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		Highway Scores		2		
		Overall Highway F	Result	1		
Land Port of Entry Border Crossing						
Number trucks	344,945			1		
Total volume [tons]						
Value of goods Millions \$						
# passenger vehicles & buses	10,321,419			1		
		POE Scores		2		
		Overall POE Resul	t	1		
Airports- None Specified						
Total volume [tons]						
		Airport Scores				
		Overall Airport Re	sult			
Maritime Ports None Specified						
Total volume [tons]						
Total number TEUs						
		Maritime Port Sco	re			
		Overall Maritime	Result			
Railroads Border Crossing at POE- None Specified						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Railroad Scores				
		Overall Railroad R	Result			
Total AADT in One Corridor	Share o	of AADT Among Cor	ridors			
11,520	100.0%	0.0%	0.0%			

POEs are assigned to Corridors based on AADT distribution. Historical data from Arizona BINS Technical Committee Representative and the Mexican Secretariat of Communications and Transportation, see Tables 6 - 9 for details.

Table 3 **Corridor Data and Results For 2020** 

	С	Corridor Raw Data			Evaluation Results	
	Sonora	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	20,806			1		
Highway Length [in miles]	784			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		Highway Scores		2		
		Overall Highway	Result	1		
Land Port of Entry Border Crossing						
Number trucks	623,005			1		
Total volume [tons]						
Value of goods Millions \$						
# passenger vehicles & buses	18,640,483			1		
		POE Scores		2		
		Overall POE Resul	lt	1		
Airports- None Specified						
Total volume [tons]						
		Airport Scores				
		Overall Airport Re	esult			
Maritime Ports None Specified						
Total volume [tons]						
Total number TEUs						
		Maritime Port Sco	ore			
		Overall Maritime	Result			
Railroads Border Crossing at POE- None Specified						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Railroad Scores				
		Overall Railroad I	Result			
Total AADT in One Corridor	Share of	AADT Among Corr	idors			
20,806	100.0%	0.0%	0.0%			

POEs are assigned to Corridors based on AADT distribution.
Forecasts for highways and POE data from the Mexican Secretariat for Communication and Transportation. Highway segment data from the segment nearest the Mexico-US border. See Tables 6 and 8 for details

Table 4 Corridor Changes and Results, 2000 - 2020

	Corridor Raw Data			Evaluati Result		
	Sonora	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	9,286			1		
Highway Length [in miles]	0			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		Highway Score	S	2		
		Overall Highwa	y Result	1		
Land Port of Entry Border Crossing						
Number trucks	278,060			1		
Total volume [tons]						
Value of goods Millions \$						
# passenger vehicles & buses	8,319,064			1		
		POE Scores		2		
		Overall POE Re	sult	1		
Airports - None Specified						
Total volume [tons]						
		Airport Scores				
		Overall Airport	Result			
Maritime Ports- None Specified						
Total volume [tons]						
Total number TEUs						
		Maritime Port	Score			
		Overall Maritin	ne Result			
Railroads Border Crossing at POE- None Specified						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Railroad Scores	5			
		Overall Railroa	d Result			
Total AADT in One Corridor	Share of	f AADT Among Co	orridors			
9,286	100.0%	0.0%	0.0%			

POE data are assigned to Corridors based on AADT distribution.

Differences are estimated by subtracting the year 2000 data from the 2020 projections.

See Tables 6 - 9 for details.

Table 5 Corridor Percent Changes and Results, 2000 - 2020

	Corridor Raw Data			Evaluatio Results		
	Sonora	В	С	Α	В	С
Highways						
Average Annual Daily Traffic	80.6%			1		
Highway Length [in miles]	0.0%			1		
LOS [A=1 to F3 = 9]						
Capacity at Peak Hour						
		<b>Highway Scores</b>		2		
		Overall Highway Result		1		
Land Port of Entry Border Crossing						
Number trucks	80.6%			1		
Total volume [tons]						
Value of goods Millions \$						
# passenger vehicles & buses	80.6%			1		
		POE Scores		2		
		Overall POE Result		1		
Airports - None Specified						
Total volume [tons]						
		Airport Scores				
		Overall Airport Result				
Maritime Ports - None Specified						
Total volume [tons]						
Total number TEUs						
		Maritime Port Score				
		Overall Maritime Result	t			
Railroads Border Crossing at POE – None Specified						
Number rail cars						
Total volume [tons]						
Total Number TEUs						
Value of goods Millions \$						
		Railroad Scores				
		Overall Railroad Result				

See Tables 6 – 9 for details.

Table 6 Highway Data

		Summary Da	ata for the So	onora Corrido	or for 2000		
	Sonoyta-San Luis Rio Colorado (MX-2)	Santa Ana- Sonoyta (MX-2)	Sonoyta- US Border (MX-8)	Santa Ana- Nogales (MX 15)	Libramiento de Nogales (MX 15D)	Nacozari De Garcia- Agua Prieta (MX 17)	Total
AADT:	2,164	801	3,371	3,542	1,191	451	11,520
Highway Length:	200.0	251.1	100.0	109.7	6.7	116.6	784.13
		Summary D	ata for the So	onora Corrido	or for 2020		
	Sonoyta- San Luis Rio Colorado (MX-2)	Santa Ana- Sonoyta (MX-2)	Sonoyta- US Border (MX-8)	Santa Ana- Nogales (MX 15)	Libramiento de Nogales (MX 15D)	Nacozari De Garcia- Agua Prieta (MX 17)	Total
AADT:	3,908	1,447	6,088	6,397	2,151	815	20,806
Highway Length:	200.0	251.1	100.0	109.7	6.7	116.6	784.13

**Source**: SourcePoint identified the Corridor and selected the highways within the corridor. AADT and highway length were obtained from data compiled by the Mexican Secretariat of Communication and Transportation

Table 7
Compiled Sonora Land Ports of Entry [POE] Crossing Data

	San Luis Rio	Sonoyta	Sasabe I	Nogales-	Nogales III	Naco	Agua	
	Colorado	Sorioyta	Colorado	Deconcini		Naco	Prieta	Total
Federal inspection facilities at	Colorado	+	Colorado	Deconcini	Mariposa	_	Prieta	iotai
POE?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	
Historical Southbound POE Cros	sing Data fo	or 2000¹						
Number trucks	40,348	3,840	2,652	0	254,694	9,817	33,594	344,945
Tons of goods								
Value [Millions \$] moved by truck								
Number of passenger vehicles	2,597,835	400,493	32,823	2,998,046	1,686,401	339,196	2,252,216	10,307,010
Number of buses	38	404	0	0	8,899	0	5,068	14,409
Number passenger vehicles & buses								10,321,419
Number of rail cars								X
Volume of tons moved by rail								X
Number of TEUs moved by rail								X
Value [Millions \$] moved by rail								X
Projected Southbound POE Cros	ssing Data fo	or 2020 <sup>2</sup>						
Number trucks								623,005
Tons of goods								
Value [Millions \$] moved by truck								
Number of passenger vehicles								X
Number of buses								X
Number passenger vehicles & buses								18,640,483
Number of rail cars								X
Volume of tons moved by rail								X
Number of TEUs moved by rail								X
Value [Millions \$] moved by rail								X
Per Cent Change in POE Data: 2	000 to 2020	Growth Rates	Provided by So	urcePoint]				
Number trucks <sup>3</sup>								80.6%

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	San Luis Rio	Sonoyta	Sasabe I	Nogales-	Nogales III	Naco	Agua	
	Colorado		Colorado	Deconcini	Mariposa		Prieta	Total
Tons of goods								
Value [Millions \$] moved by truck								
Number of passenger vehicles								X
Number of buses								X
Number passenger vehicles & buses <sup>4</sup>								80.6%
Number of rail cars								X
Volume of tons moved by rail								X
Number of TEUs moved by rail								X
Value [Millions \$] moved by rail								X

Number of trucks = southbound trucks that cross the US-Mexico border

Tons of goods = carried by southbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by southbound trucks that cross the US-Mexico border.

Number of passenger vehicles = southbound passenger vehicles that cross the US-Mexico border.

Number of buses = southbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of southbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = southbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by the southbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are southbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by southbound rail cars that cross the US-Mexico border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT

#### Sources:

- For all of the seven POEs in Sonora, SourcePoint used the data provided by the Arizona BINS Technical Committee representative. Southbound truck, passenger vehicle and bus data provided by the Arizona BINS Technical Committee representative are the same data used for southbound truck, passenger vehicle and bus crossings for Sonora. This was done because no data was provided by the Sonora BINS representative Technical Committee
- <sup>2</sup> Calculated by Multiplying 2000 Historical Data by Growth Rates
- <sup>3</sup> The 80.6% growth rate for truck data is based on a compound annual growth rate of 3.0% the level specified by the Mexican Secretariat of Communications and Transportation data for Sonora.
- The growth rate for passenger vehicles and buses is the same as that observed for the change in Average Annual Daily Traffic [AADT] in the highway segments nearest the Mexico-US border. These AADT data are obtained for MX-2, MX-15, MX-17, MX State Road and MX Toll Road from the Mexican S ecretariat of Communications and Transportation. The total change in AADT was 11,022 or 80.6%. The 80.6% is used to forecast the number of border crossings for passenger vehicles and buses in 2020.

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## Table 8 Airport Data

## Table 9 Maritime Port Data

No Maritime Ports were specified by the Sonora BINS Technical Committee representative.



Map 1 Sonora Border Area

# CORRIDOR EVALUATION TAMAULIPAS RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

## **GENERAL DESCRIPTION OF TAMAULIPAS' CORRIDORS**

### **Corridors**

Tamaulipas has identified six corridors for the study and they are called the Nuevo Laredo Corridor, the Reynosa Corridor, the Matamoros Corridor, the Miguel Alemán Corridor, the Camargo Corridor, and the Nuevo Progreso Corridor.

## **Highways**

The Nuevo Laredo Corridor is composed of portions of two highways: MX-2 and MX-85. The Reynosa Corridor is composed of portions of three highways: MX-2, MX-40, and MX-97. The Matamoros Corridor is composed of portions of two highways: MX-2 and MX-180. The Miguel Alemán Corridor is composed of portions of two highways: MX-2 and MX-54. The Camargo Corridor is composed of portions of two highways: MX-2 and MX-SIN NUM [SN]. The Nuevo Progreso Corridor is composed of portions of one highways: MX-2.

## **Land Ports of Entry [POE]**

Tamaulipas has 14 POEs on the Mexico-US border that are served by 13 bridges and one ferry. The names of the POEs are the following: Nuevo Laredo I [Puente Viejo], Nuevo Laredo II, Comercio Mundial-Puente III, Nuevo Ciudad Guerrero, Miguel Aleman, Camargo, Gustavo Diaz Ordaz [ferry crossing], Puente Reynosa, Puente Nuevo Amanecer [at Reynosa], Nuevo Progreso, Puerto Mexico-Puente Nuevo [at Matamoros], Puente Viejo [at Matamoros] Los Indios-Puente Lucio Blanco and Los Tomatoes-Puente General.

In calendar year 2000, about 1.5 million trucks crossed into Tamaulipas through 10 of the land POEs and about 25.3 million passenger vehicles and buses entered Tamaulipas through all 14 land POEs.

## **Airports**

There are three airports in Tamaulipas that meet the minimum corridor evaluation criteria [located within 100 km of the US-Mexico border and designated as an international port of entry]. The airports are at Nuevo Laredo, Reynosa and Matamoros. In calendar year 2000 about one million tons of goods were transported at two of the three airports. Tamaulipas envisions goods transported by airplane increasing about 64% to 1.7 million tons in 2020.

#### Railroads

The Ferrocarril del Noreste [FNE] operates within Tamaulipas and has rail lines that cross the Mexico-US border at Nuevo Laredo, Reynosa, and Matamoros. Data are provided on the number of rail cars and tonnage that cross south into Tamaulipas from the US through the POE at Puente Viejo [at Matamoros], and Nuevo Laredo. In calendar year 2000, about 340,000 rail cars carrying about 28 million tons transited the POE at Puente Viejo and Nuevo Laredo.

The rail line that crosses at Nuevo Laredo is assigned to the Nuevo Laredo Corridor and the rail line that crosses at Puente Viejo is assigned to the Matamoros Corridor.

#### **Maritime Ports**

Tamaulipas has one maritime port that meets the minimum corridor evaluation criteria [within 100 km of the US-Mexico border and designated as an international port of entry]. That port is located at Mezquital and has a channel depth of 4 meters.

In calendar year 2000, about 6,000 tons of goods and no containers were moved through the El Mezquital maritime port. Tamaulipas envisions substantial growth in the Mezquital maritime port with the channel depth increasing to 12 meters and goods shipped projected to increase to 5 million tons in 2020. This represents a growth of about 83000%.

**Source:** Tamaulipas BINS Technical Committee representative..

#### **ANALYSIS OF CORRIDOR EVALUATION RESULTS**

The Reynosa Corridor is listed first. The Matamoros Corridor is listed second. The Miguel Alemán Corridor is listed third. The Nuevo Laredo Corridor is listed fourth. The Nuevo Progreso Corridor is listed fifth. The Camargo Corridor is listed sixth.

The Reynosa Corridor obtains its first place listing by virtue of the fact that it is listed first with respect to the historical data, and listed second with respect to the change data. The Matamoros Corridor obtains its second place listing because it is listed second with respect to the historical data, and listed first with respect to the change data. With regard to historical data, the Reynosa Corridor

obtained one third fewer points when compared to the Matamoros Corridor [34 vs. 52]. With regard to change data, the Reynosa Corridor obtained five points more than the Matamoros Corridor [38 vs.33].

#### **Historical Data**

This discussion reviews highway, land POE, airport, rail and maritime port data with their results. With regard to the highways, the Reynosa Corridor is listed first because it is listed first for two of the four indicators [AADT and Capacity] and second for highway length. The Reynosa Corridor's AADT is about two times larger than the #2 Corridor [24,372 vs. 10,638]; while its capacity is 49% larger than the #2 corridor [10,158 vs. 6,800]. Highway Length is the only indicator where the #2 Corridor [Matamoros] is larger than the #1 Corridor [493 vs. 407 km].

For truck and passenger vehicle data, airport data, and maritime port data, the Reynosa Corridor is always listed first by virtue of the fact that those data are allocated based on the distribution of AADT amongst the Corridors. As noted above, the Reynosa Corridor is listed first with respect to AADT. Regarding railroads, the Nuevo Laredo Corridor is listed first, the Matamoros Corridor second and all the other corridors are tied for third because there are only two corridors with railroads assigned to them. The rail crossings data at Nuevo Laredo are larger than the rail crossing data at Puente Viejas [Matamoros].

## **Change Data**

This discussion reviews highway, land POE, airport and maritime port data for both absolute changes and percent changes. With regard to absolute changes in highway data, the Reynosa Corridor is listed first for two of the four indicators [AADT & Capacity] and tied for first for Highway Length with the other corridors [as there was no change in highway length for any of the six corridors]. The Matamoros Corridor is listed first for LOS, tied for first for Highway Length, and listed second for AADT.

For truck data, passenger vehicles and bus data, airport data and maritime port data, the Reynosa Corridor is always listed first by virtue of the fact that its 2000 year data is larger than the other three corridors and all the corridors use the same growth rates. Regarding railroads, the Nuevo Laredo is listed first and the Matarmoros Corridor is listed second because there were larger rail crossing increases at Nuevo Laredo.

With regard to percent changes in highway data, the Reynosa Corridor is listed first in AADT growth [with 174.7%]; first for growth in capacity at peak hours [with 120.8%] and tied for first with regard to Highway Length [there was no change for all six corridors]. The Matamoros Corridor is listed first for LOS, tied for first for Highway Length and listed second for Capacity.

For truck data, passenger vehicles and bus data, airport data and maritime port data, all three corridors are tied for first because each corridor has the same growth rate for each mode [80.6% for trucks, 148.2% for passenger vehicles and buses, 63.9% for airports, and 83,233% for maritime ports]. Regarding railroads, the Nuevo Laredo and Matamoras Corridors are tied for first because they are the only two corridor with a growth rate, and it is 80.6 percent.

Table 1
Summary Corridor Results

			Corrid	lor Scores <sup>1</sup>			E	valu	atio	n Re	sult	:s
	Α	В	С	D	E	F	Α	В	С	D	Ε	F
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso						
Historical Data for 2000 <sup>2</sup>												
Highways	28	14	28	28	32	36	2	1	2	2	5	6
Land Ports of Entry	16	4	8	12	24	20	4	1	2	3	6	5
Airports <sup>3</sup>	8	2	4	6	12	10	4	1	2	3	6	5
Maritime Ports <sup>4</sup>	8	2	4	6	12	10	4	1	2	3	6	5
Railroads <sup>5</sup>	4	12	8	12	12	12	1	3	2	3	3	3
Sum of Historical Scores:	64	34	52	64	92	88	3	1	2	3	6	5
Changes Between 2000 and	2020 <sup>6</sup>											
Highways	27	15	20	18	32	26	5	1	3	2	6	4
Land Ports of Entry	12	4	6	8	14	10	5	1	2	3	6	4
Airports <sup>3</sup>	6	2	3	4	7	5	5	1	2	3	6	4
Maritime Ports <sup>4</sup>	6	2	3	4	7	5	5	1	2	3	6	4
Railroads <sup>5</sup>	4	12	6	12	12	12	1	3	2	3	3	3
Sum of Change Scores:	55	35	38	46	72	58	4	2	1	3	6	5
Overall Scores <sup>7</sup> :	119	69	90	110	164	146						
Overall Result:	4	1	2	3	6	5						

- $^{\rm 1}\,$  The Corridor Scores are the Evaluation Results in Tables 2, 4 and 5.
- <sup>2</sup> Historical Scores from Table 2. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- <sup>3</sup> Tamaulipas has three airports within 100 km of the US-Mexico border that are designated as international ports of entry
- <sup>4</sup> Tamaulipas has one maritime port located within 100 km of the US-Mexico border that is designated as an international port of entry.
- <sup>5</sup> The Ferrocarril del Noreste [FNE] operates in Tamaulipas and crosses the Mexico-US border at three POE. Rail data was provided for two POE and rail lines were assigned to the Nuevo Laredo and Matamoros Corridors.
- <sup>6</sup> The Changes Scores is the sum of the Corridor Scores from Table 4 [Corridor Changes] and the Corridor Scores from Table 5 [Corridor Percent Changes].
- <sup>7</sup> The Overall Score is the sum of the *Historical Score* and the *Changes Score*. The *Historical Data* scores and the *Changes Between 2000 and 2020* scores are equally weighted.

Table 2 Corridor Data For 2000

			Corridor	Raw Data				Eva	luatio	on Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	E	F
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso						
Highways	<b>,</b>	<b>1</b> .										
Average Annual Daily Traffic	8,855	24,372	10,638	9,904	7,480	8,290	4	1	2	3	6	5
Highway Length [in km]	346.7	406.8	492.5	170.8	117.1	28.0	3	2	1	4	5	6
LOS [A=1 to F = 9]	2.196	2.485	2.128	2.407	2.763	3.357	5	3	6	4	2	1
Capacity at Peak Hour	5,981	10,158	4,766	5,600	5,600	2,800	2	1	5	3	3	6
				Highway S	cores		14	7	14	14	16	18
				Overall Highway Results			2	1	2	2	5	6
Land Port of Entry Border Crossing												
Number trucks	195,684	538,602	235,097	218,870	165,309	183,205	4	1	2	3	6	5
Total volume [tons]												
Value of goods Millions \$								ŀ			ŀ	
# passenger vehicles & buses	3,216,319	8,852,628	3,864,137	3,597,413	2,717,075	3,011,221	4	1	2	3	6	5
				POE Scores	POE Scores		8	2	4	6	12	10
				Overall PO	E Results		4	1	2	3	6	5
Airports												L
Total volume [tons]	131,507	361,960	157,994	147,089	111,094	123,121	4	1	2	3	6	5
				Airport Sco	ores		4	1	2	3	6	5
				Overall Airport Results			4	1	2	3	6	5
Maritime Ports												<u></u>
Total volume [millions tons]	764	2,103	918	855	645	715	4	1	2	3	6	5
Total number TEUs									<u> </u>			<u> </u>
				Ma	ritime Port S	core	4	1	2	3	6	5
				Overall Maritime Results				1	2	3	6	5

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			Corridor	Raw Data			Evaluatio			on Results				
	Α	В	С	D	E	F	Α	В	С	D	Е	F		
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso								
Railroads Border Crossing at POE <sup>1</sup>														
Number rail cars	250,069		89,623				1	3	2	3	3	3		
Total volume [tons]	20,005,520		8,066,070				1	3	2	3	3	3		
Total Number TEUs														
Value of goods Millions \$														
				Railroad So	cores		2	6	4	6	6	6		
				Overall Railroad Results				3	2	3	3	3		
Total AADT in Six Corridors		Share of AADT Among Corridors												
69,539	12.7%	35.0%	15.3%	14.2%	10.8%	11.9%								

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Historical data from Tamaulipas BINS Technical Committee Representative, see Tables 6 - 9 for details.

The Ferrocarril del Noreste [FNE] operates in Tamaulipas and crosses the Mexico-US border at three ports of entry. Rail data was provided for two POE and rail lines were assigned to the Nuevo Laredo and Matamoros Corridors.

Lower Score represents greater need.

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Table 3
Corridor Data and Results for 2020

			Corridor I	Raw Data				Eva	on Re	n Results			
	Α	В	С	D	Е	F	Α	В	С	D	Ε	F	
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso							
Highways	·				l								
Average Annual Daily Traffic	17,999	66,955	22,803	21,799	15,620	20,147	5	1	2	3	6	4	
Highway Length [in km]	346.7	406.8	492.5	170.8	117.1	28.0	3	2	1	4	5	6	
LOS [A=1 to F = 9]	1.702	1.317	1.718	1.835	1.208	2.000	4	5	3	2	6	1	
Capacity at Peak Hour	10,905	22,430	8,888	12,360	11,064	6,000	4	1	5	2	3	6	
	Highway Scores			16	9	11	11	20	17				
				Overall Hig	Overall Highway Results		4	1	3	3	6	5	
Land Port of Entry Border Crossing													
Number trucks	302,179	1,124,085	382,826	365,980	262,243	338,242	5	1	2	3	6	4	
Total volume [tons]													
Value of goods Millions \$													
# passenger vehicles & buses	6,825,403	25,390,060	8,647,018	8,266,510	5,923,357	7,639,977	5	1	2	3	6	4	
				POE Scores	3		10	2	4	6	12	8	
				Overall PO	E Results		5	1	2	3	6	4	
Airports													
Total volume [tons]	184,244	685,375	233,416	223,145	159,894	206,232	5	1	2	3	6	4	
				Airport Scores			5	1	2	3	6	4	
				Overall Air	port Results		5	1	2	3	6	4	
Maritime Ports													
Total volume [millions tons]	544,357	2,024,974	689,639	659,292	472,415	609,323	5	1	2	3	6	4	
Total number TEUs											<u> </u>	<u> </u>	
				Mai	ritime Port S	core	5	1	2	3	6	4	
				Overall Ma	ritime Resul	ts	5	1	2	3	6	4	

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			Corridor F	Raw Data			Evaluation Res					;
	Α	В	С	D	E	F	Α	В	С	D	Е	F
	Nuevo Laredo		Nuevo Progreso									
Railroads Border Crossing at POE <sup>1</sup>												
Number rail cars	451,650		161,868				1	3	2	3	3	3
Total volume [tons]	36,131,970		14,568,129				1	3	2	3	3	3
Total Number TEUs												
Value of goods Millions \$												
<del>-</del>				Railroad S	cores		2	6	4	6	6	6
				Overall Ra	s	1	3	2	3	3	3	
Total AADT in Six Corridors		Sha	re of AADT A	Among Corridors								
165,323	10.9%	40.5%	13.8%	13.2%	9.4%	12.2%						

Lower Score represents greater need.

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POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

The Ferrocarril del Noreste [FNE] operates in Tamaulipas and crosses the Mexico-US border at three ports of entry. Rail data was provided for two POE and rail lines were assigned to the Nuevo Laredo and Matamoros Corridors.

Table 4
Corridor Changes and Results, 2000-2020

			Corridor	Raw Data				Eva	on Re	n Results		
	Α	В	С	D	E	F	Α	В	С	D	Е	F
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso						
Highways	•		I		I	l						
Average Annual Daily Traffic	9,144	42,583	12,164	11,895	8,140	11,857	5	1	2	3	6	4
Highway Length [in km]	0	0	0	0	0	0	1	1	1	1	1	1
LOS [A=1 to F = 9]	-0.49	-1.17	-0.41	-0.57	-1.56	-1.36	2	4	1	3	6	5
Capacity at Peak Hour	4,924	12,272	4,122	6,760	5,464	3,200	4	1	5	2	3	6
				Highway S	cores		12	7	9	9	16	16
				Overall Hig	ghway Result	ts	4	1	3	3	6	6
Land Port of Entry Border Crossing												
Number trucks	118,264	550,733	157,324	153,844	105,275	153,348	5	1	2	3	6	4
Total volume [tons]												<u> </u>
Value of goods Millions \$												<u> </u>
# passenger vehicles & buses	3,573,676	16,641,983	4,754,011	4,648,839	3,181,184	4,633,838	5	1	2	3	6	4
				POE Scores	6		10	2	4	6	12	8
				Overall PO	E Results		5	1	2	3	6	4
Airports												<u> </u>
Total volume [tons]	62,964	293,214	83,761	81,908	56,049	81,643	5	1	2	3	6	4
				Airport Sco	ores		5	1	2	3	6	4
				Overall Air	port Results		5	1	2	3	6	4
Maritime Ports												<u> </u>
Total volume [millions tons]	476,763	2,220,204	634,232	620,201	424,401	618,199	5	1	2	3	6	4
Total number TEUs												<u> </u>
				Ma	ritime Port S	core	5	1	2	3	6	4
				Overall Ma	aritime Resul	ts	5	1	2	3	6	4

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			Corridor	Raw Data				Eva	luatio	on Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	Е	F
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso						
Railroads Border Crossing at POE <sup>1</sup>												
Number rail cars	201,581		72,245				1	3	2	3	3	3
Total volume [tons]	16,126,450		6,502,059				1	3	2	3	3	3
Total Number TEUs												
Value of goods Millions \$												
-				Railroad S	cores		2	6	4	6	6	6
				Overall Railroad Results				3	2	3	3	3
Total AADT in Six Corridors		Shai	are of AADT Among Corridors									
95,784	9.5%	44.5%	12.7%	12.4%	8.5%	12.4%						

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Lower Score represents greater need.

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Differences are estimated by subtracting the year 2000 data from the 2020 projections., see Tables 6 - 9 for details.

The Ferrocarril del Noreste [FNE] operates in Tamaulipas and crosses the Mexico-US border at three ports of entry. Rail data was provided for two POE and rail lines were assigned to the Nuevo Laredo and Matamoros Corridors.

Table 5
Corridor Percent Changes and Results, 2000-2020

			Corridor	Raw Data				Eva	luatio	on Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	E	F
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso						
Highways												
Average Annual Daily Traffic	103.3%	174.7%	114.3%	120.1%	108.8%	143.0%	6	1	4	3	5	2
Highway Length [in km]	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	1	1	1	1	1	1
LOS [A=1 to F = 9]	-22.5%	-47.0%	-19.3%	-23.8%	-56.3%	-40.4%	2	5	1	3	6	4
Capacity at Peak Hour	82.3%	120.8%	86.5%	120.7%	97.6%	114.3%	6	1	5	2	4	3
				Highway S	cores		15	8	11	9	16	10
				Overall High	ghway Result	ts	5	1	4	2	6	3
Land Port of Entry Border Crossing												
Number trucks	80.6%	80.6%	80.6%	80.6%	80.6%	80.6%	1	1	1	1	1	1
Total volume [tons]												
Value of goods Millions \$												
# passenger vehicles & buses	148.2%	148.2%	148.2%	148.2%	148.2%	148.2%	1	1	1	1	1	1
				POE Score	S		2	2	2	2	2	2
				Overall PO	E Results		1	1	1	1	1	1
Airports												<u> </u>
Total volume [tons]	63.9%	63.9%	63.9%	63.9%	63.9%	63.9%	1	1	1	1	1	1
				Airport Sc	ores		1	1	1	1	1	1
				Overall Air	port Results		1	1	1	1	1	1
Maritime Ports												
Total volume [millions tons]	83233%	83233%	83233%	83233%	83233%	83233%	1	1	1	1	1	1
Total number TEUs									<u> </u>		<u> </u>	<u> </u>
				Ma	ritime Port S	core	1	1	1	1	1	1
				Overall Ma	aritime Resul	ts	1	1	1	1	1	1

			Corridor	Raw Data				Eva	luatio	on Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	Ε	F
	Nuevo Laredo	Reynosa	Mata- moros	Miguel Alemán	Camargo	Nuevo Progreso						
Railroads Border Crossing at POE <sup>1</sup>												
Number rail cars	80.6%		80.6%				1	3	1	3	3	3
Total volume [tons]	80.6%		80.6%				1	3	1	3	3	3
Total Number TEUs												
Value of goods Millions \$												
				Railroad S	cores		2	6	2	6	6	6
				Overall Ra	ilroad Result	s	1	3	1	3	3	3

#### Notes:

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

See Tables 6 - 9 for details.

Lower Score represents greater need.

The Ferrocarril del Noreste [FNE] operates in Tamaulipas and crosses the Mexico-US border at three ports of entry. Rail data was provided for two POE and rail lines were assigned to the Nuevo Laredo and Matamoros Corridors.

Table 6 Highway Data

	Su	ımmary Data	for the	Nue	vo Laredo	Corrid	or		
		Year 2000					Year 20	20	
	MX-2	MX-85	Tota	ıl	MX-2	2	MX-	85	Total
AADT:	1,558	7,297	8,85	5	3,254		14,74	45	17,999
Highway Length:	118.7	228.0	346.	7	118.7		228.		346.7
LOS:	В	В	В		В		А		Α
LOS #:	2.00	2.30			2.00		1.5	5	
Weighted Average LOS:	0.7	1.5	2.2		0.7		1.0		1.7
Capacity:	2,800	3,181	5,98	1	4,000	)	6,90	5	10,905
	Sum	nmary Data fo	or the R	eyno	sa Corrido	r for 2	000		
		MX-2			MX-40	MX-	97	Total	
	AADT	: 11,327	,		9,972	3,072	<u> </u>	24,372	
High	way Length				225.0	115.1		406.8	
<u> </u>	LOS	_			В	В		В	
	LOS #				2.80	2.00			
Weighted A	verage LOS	: 0.4			1.5	0.6		2.5	
<del>-</del>	Capacity				4,000	2,800	)	10,158	3
	Sum	nmary Data fo	or the R	eyno	sa Corrido	r for 2	020		
		MX-2			MX-40	MX-	97		Total
	AADT	: 26,232	2		31,623	9,100	)	66,955	
High	way Length	: 66.7			225.0	115.1		406.8	
	LOS	: A			Α	Α		A	
	LOS #	: 1.5			1.4	1.0			
Weighted A	verage LOS	: 0.3			8.0	0.3		1.3	
	Capacity	: 6,930			7,500	8,000	)	22,430	)
	S	Summary Data	a for th	е Ма	tamoros C	orrido	r		
		Year 2000					Year 20	20	
	MX-2	MX-180	Tota	ıl	MX-2	2	MX-180		Total
AADT:	6,877	3,761	10,63	38	15,31	9	7,484		22,803
Highway Length:	76.0	416.5	492.		76.0		416.5		492.5
LOS:	С	Α	В		В		Α		Α
LOS #:	3.0	2.0			2.0		1.7		-
Weighted Average LOS:	0.5	1.7	2.1		0.3		1.4		1.7
Capacity:	2,411	2,355	4,76	6	4,000	)	4,888		8,888
	Sui	mmary Data	for the	Migu	ıel Alemán	Corric	lor	•	
		Year 2000					Year 20	20	
	MX-2	MX-54	Tota	al	MX-2	2	MX-54		Total
AADT:	3,030	6,874	9,90		6,327		15,472		21,799
Highway Length:	14.6	156.2	170.		14.6		156.2		170.8
LOS:	С	В	В		В		Α		A
LOS #:	3.0	2.4			2.0		1.8		
								l l	

Weighted Average LOS:	0.3	2.2	2.4	0.2	1.7	1.8
Capacity:	2,800	2,800	5,600	6,000	6,360	12,360
		Summary Da	ita for the C	amargo Corrido	or	
		Year 2000			Year 20	20
	MX-2	MX-SN	Total	MX-2	MX-SN	Total
AADT:	5,178	2,302	7,480	10,813	4,807	15,620
Highway Length:	52.1	65.0	117.1	52.1	65.0	117.1
LOS:	В	С	В	А	Α	A
LOS #:	2.5	3.0		1.5	1.0	
Weighted Average LOS:	1.1	1.7	2.8	0.7	0.6	1.2
Capacity:	2,800	2,800	5,600	5,064	6,000	11,064
	Su	mmary Data	for the Nuev	o Progreso Cor	ridor	
		Year 2000			Year 20	20
	MX-	2	Total	MX-2		Total
AADT:	8,290	)	8,290	20,147		20,147
Highway Length:	28.0		28.0	28.0		28.0
LOS:	С		С	В		В
LOS #:	3.4			2.0		
Weighted Average LOS:	3.4		3.4	2.0		2.0
Capacity:	2,800	)	2,800	6,000		6,000
LOS coding: A =	1, B = 2, C = 3	, D = 4, E = 5, F =	6			

Table 7
Land Ports of Entry [POE] Crossing Data

Corridor ID <sup>6</sup>	Α	В	С	D	E	F	G	Н	1	J	K	L	М	N	
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Total
Southbound PO			1	100	1 100	100	1.00	1 100	100	1.00	100	1 00	100	100	Total
Number trucks	2,656	8,247	981,503	0	10,342	24,856	0	5,413	312,462	21,813	1,298	0	45,832	122,345	1,536,767
Tons of goods Value [Millions \$] moved by truck															
Number of passenger vehicles	1,728,043	5,364,663	81,119	0	1,178,056	636,998	0	5,371,476	2,230,731	1,114,920	2,324,118	2,555,000	702,291	1,823,702	25,111,117
Number of buses	284	38,180	130	0	3,464	97	0	24,686	4,703	390	744	0	5,697	69,301	147,676
Number passenger vehicles & buses															25,258,793
Number of rail cars <sup>2</sup>	250,069											89,623			X
Volume of tons moved by rail <sup>2</sup>	20,005,520											8,066,070			X
Number of TEUs moved by rail															X
Value [Millions \$] moved by rail															X
Southbound PO	E Crossing D	ata for 202	O <sup>3</sup>												
Number trucks															2,775,555
Tons of goods															
Value [Millions \$] moved by truck															
Number of passenger vehicles															
Number of buses															

Corridor ID <sup>6</sup>	Α	В	С	D	E	F	G	Н	I	J	K	L	M	N	
Southbound PO	E Crossina D	ata for 202	20³												
Number	<b>.</b>		1												
passenger															
vehicles & buses															62,692,324
Number of rail															
cars	451,650											161,868			X
Volume of tons															
moved by rail	36,131,970											14,568,129			X
Number of TEUs															
moved by rail															X
Value [Millions															X
\$] moved by rail															^
Percent Change	in POE Data	: 2000 to 20	020												
Number trucks <sup>4</sup>															80.6%
Tons of goods															
Value [Millions															
\$] moved by															
truck															
Number of															
passenger															
vehicles															X
Number of															
buses															X
Number															
passenger vehicles &															
buses <sup>5</sup>															148.2%
Number of rail							-			-					140.270
cars	80.6%											80.6%			X
Volume of tons	00.070		+		+	+					+	30.070			^
moved by rail	80.6%											80.6%			X
Number of TEUs															
moved by rail															X
Value [Millions															X
\$] moved by rail															^

#### Notes:

Number of trucks = southbound trucks that cross the Mexico-US border

Tons of goods = carried by southbound trucks that cross the Mexico-US border.

Value [Millions \$] moved by truck = value of goods moved by southbound trucks that cross the Mexico-US border.

Number of passenger vehicles = southbound passenger vehicles that cross the Mexico-US border.

Number of buses = southbound buses that cross the Mexico-US border.

Number passenger vehicles & buses = sum of southbound passenger vehicles and buses that cross the Mexico-US border.

Number of rail cars = southbound rail cars that cross the Mexico-US border.

Volume of tons moved by rail = transported by southbound rail cars that cross the Mexico-US border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are southbound and cross the Mexico-US border.

Value [Millions \$] moved by rail = value of goods transported by southbound rail cars that cross the Mexico-US border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee representative. This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- From the Tamaulipas BINS Technical Committee representative.
- <sup>2</sup> Derived my multiplying the 2000 data by the appropriate growth rate.
- Rail data in Nuevo Laredo cross at the rail bridge that is located west of Nuevo Laredo I. For this study, the rail data are assigned to the Nuevo Laredo I POE.
- <sup>4</sup> Based on a 3.0% compound annual growth rate provided by the Mexican Secretariat of Communications and Transportation.
- This growth rate is from the growth rate in AADT for the first segment of the five highways that are directly connected to the five land POE. Together, the five highways AADT increases 33,488 between 2000 and 2020 a 148.2% increase.
- 6 Corridor ID translates as follows
  - A Nuevo Laredo
  - B Comercio Mundial [Laredo]
  - C Nueva Cd. Guerrero
  - D Miguel Alemán
  - E Camargo
  - F Gustavo Díaz Ordaz
  - G Puente Reynosa
  - H Puente Nuevo Amanecer [Reynosa]
  - I Nuevo Progreso
  - J Puerto MX- Puente Nuevo [Matamoros]
  - K Puente Viejo [Matamoros]
  - L Los Indios-Puente Lucio Blanco [Matamoros]
  - M Los Tomates-Puente General [Matamoros]

Table 8
Airport Data

	Nuevo Laredo	Reynosa	Matamoros	Total
Within 100 km of the US-Mexico Border?	Yes	Yes	Yes	
Designated as an International POE?	Yes	Yes	Yes	
Historical Data for 2000				
Longest runway length, in meters	2,000		2,300	2,300
Tons of goods exported & imported	1,022,608		10,157	1,032,765
Airport served by railroad facility?	No	No	No	Χ
If yes, name of railroad				Χ
On-land movement of air freight	Χ	Х	Х	Χ
Share of goods moved by truck				Χ
Share of goods moved by railroad				Χ
Projections for 2020				
Longest runway length				
Date becomes operational				Χ
Tons of goods exported & imported	1,675,662		16,643	1,692,305
Airport served by railroad facility?	No	No	No	Χ
If yes, name of railroad				Χ
On-land movement of air freight	Χ	Х	Х	Χ
Share of goods moved by truck				
Share of goods moved by railroad				
Percent Change: 2000 to 2020				
Longest runway length				
Tons of goods exported & imported				63.9%
Source: Tamaulipas BINS Technical Committee repres	sentative.			

Table 9 Maritime Port Data

		Port at	El Mezquital	
Within 100 km of the US-Mexico Border?	Yes			
Designated as an International POE?	Yes			
	2000	2020	Changes 20	000 to 2020
			Absolute	Percent
Main Channel Depth, in meters	4.0	12.0	8.0	200.0%
Total tons of goods exported & imported <sup>1</sup>	6,000	5,000,000	4,994,000	83233.3%
Total number TEUs exported & imported				
Maritime ports served by railroad facility?	No	Yes		
If yes, name of railroad				
On-land movement of air freight				
Share of goods moved by truck		60.0%		
Share of goods moved by railroad		40.0%		

#### Notes:

Puerto de Altamira and Puerto de Tampico are not located within 100 km of the Mexico-US border.

**Sources:** Tamaulipas BINS Technical Committee representative.

<sup>&</sup>lt;sup>1</sup> metric tons

Map 1 Tamaulipas Border Area



#### TAMAULIPAS HIGHWAY SUMMARY

# Methodology For Calculating Corridor Averages for Average Annual Daily Traffic [AADT], Level of Service [LOS], and Peak Hour Traffic Carrying Capacity

Corridor totals for highways are obtained for highway length, AADT, LOS and Peak Hour Traffic Carrying Capacity. The corridor total for each of these indicators is obtained by adding the data for each of the highways assigned to the corridor. The State BINS Technical Committee representative assigned the highways to the corridors. Each of the compilations for each of the indicators is now reviewed.

**Highway Length**—the length of each highway within the 100 km limit. The length is obtained for each highway by subtracting the beginning mile marker, from the last mile marker. If segments are omitted, those segments and their data are omitted from the highway total. The highway length for the entire corridor is obtained by summing the highway length for each highway in the corridor.

**Weighted Average**—an average in which each of the observations is multiplied [or "weighted"] by a factor before calculations. In addition, these weights sum to unity or one [1]. Weighted averages are used so that short and long segments of roadway are counted proportionately in calculating the average for the entire highway.

**Average Annual Daily Traffic**—the weighted average AADT for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the AADT for that segment to obtain the weighted AADT for the segment. Step 3: The weighted AADT for all the segments are summed to obtain the weighted average AADT for the highway. The weighted average AADT for all the highways in the corridor are then summed to obtain the Corridor Total AADT.

**Level of Service**—the weighted average LOS for each highway is calculated in the same manner as that used for AADT. A major difference is that LOS is provided in the letters A, B, C, D, E, F0, F1, F2 and F3. These letters are converted to numbers using the following system, A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, and F3=9. After the conversions the following steps are used to calculate LOS for each highway. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the LOS number for that segment to obtain the weighted LOS number for the segment. Step 3: The weighted LOS number for all the segments are summed to obtain the weighted average LOS for the highway. The weighted average LOS number for all the highways in the corridor are then summed to obtain the Corridor Total LOS.

**Peak Hour Traffic Carrying Capacity [PCAP]**—the weighted average PCAP for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the PCAP for that segment to obtain the weighted PCAP for the segment. Step 3: The weighted PCAP for all the segments are summed to obtain the weighted average PCAP for the highway. The weighted average PCAP for all the highways in the corridor are then summed to obtain the Corridor Total PCAP.

						Table 9						
					ay Data Cor							
				Used in Tabl				•				
		Segment	t Length i	s the Basis for	Estimating	the Weig	hted Avera	ge for AA	DT, LOS a	nd Capacity		T
				Sumn	nary Data fo	r the Peyn	osa Corridor					
		Cale	ndar Year		lary Data 10	THE RESTR	Ja Corridor		ndar Year 2	2020		
	MX-2	MX-40	MX-97	Tota	ı		MX-2	MX-40	MX-97	Total		
AADT:	11,327	9,972	3,072	24,37	2		26,232	31,623	9,100	66,955		
Highway Length:	66.7	225.0	115.1	406.8	8		66.7	225.0	115.1	406.8		
LOS:	В	В	В	В			Α	Α	Α	Α		
LOS #:	2.3	2.8	2.0				1.5	1.4	1.0			
Weighted Average LOS:	0.4	1.5	0.6	2.5			0.3	0.8	0.3	1.3		
Capacity:	3,358	4,000	2,800	10,15	8		6,930	7,500	8,000	22,430		
	Cala		•	the Nuevo Lare		2020	Cala	Summa endar Year		or the Matamoros C		2020
	Cale	ndar Year	2000	Ca	alendar Year	2020	Cale	endar Year	2000	Cale	ndar Year	2020
	MX-2	MX-85	Total	MX-2	2 MX-85	Total	MX-2	MX-180	Total	MX-2	MX-180	Total
AADT:	1,558	7,297	8,855	3,254	1 14,745	17,999	6,877	3,761	10,638	15,319	7,484	22,803
Highway Length:	118.7	228.0	346.7	118.7	7 228.0	346.7	76.0	416.5	492.5	76.0	416.5	492.5
LOS:	В	В	В	В	Α	Α	С	Α	В	В	Α	Α
LOS #:	2.0	2.3		2.0	1.5		3.0	2.0		2.0	1.7	
Weighted Average LOS:	0.7	1.5	2.2	0.7	1.0	1.7	0.5	1.7	2.1	0.3	1.4	1.7
Capacity:	2,800	3,181	5,981	4,000	6,905	10,905	2,411	2,355	4,766	4,000	4,888	8,888
	ا ۵۰ مطنع	α. Λ – 1. Β	2.0-2	D = 4, E = 5, F = 6								
	ros cogiu	ig: A = 1, B	0 = ∠, ∪ = 3, I	U = 4, E = 5, F = 6								

								Corridor					
		Soamoni	t Longth i					ation for T	•		and Capacity		
		Segment	Lengun	is the bas	13 IUI ESI	linating	the weigh	iteu Avera	ge ioi AA	DI, LOS A	and Capacity		
		Summar	y Data for	the Migue	el Alemán	Corridor			Summ	nary Data	for the Camargo Co	orridor	
	Cale	ndar Year		J		ndar Year	2020	Cale	endar Year			ndar Year	2020
	B # 1/ O	B 4 3 / E 4	T-4-1		B 43/ O	BAN E 4	T-4-1	BAN O	NAV C N	T-4-1	BAY O	BAY C BI	T-1-1
	MX-2	MX-54	Total		MX-2	MX-54	Total	MX-2	MX-S.N.	Total	MX-2	MX-S.N.	Total
AADT:	3,030	6,874	9,904		6,327	15,472	21,799	5,178	2,302	7,480	10,813	4,807	15,620
Highway Length:	14.6	156.2	170.8		14.6	156.2	170.8	52.1	65.0	117.1	52.1	65.0	117.1
LOS:	С	В	В		В	Α	Α	В	С	В	A	Α	Α
LOS #:	3	2			2	2		2	3		1	1	
Weighted Average LOS:	0.3	2.2	2.4		0.2	1.7	1.8	1.1	1.7	2.8	0.7	0.6	1.2
Capacity:	2,800	2,800	5,600		6,000	6,360	12,360	2,800	2,800	5,600	5,064	6,000	11,064
		Summary	, Data for	the Nuevo	Drogress	Corridor							
	Cale	ndar Year		the Naeve		ndar Year							
	MX-2		Total		MX-2		Total						
AADT:	8,290		8,290		20,147		20,147						
Highway Length:	28.0		28.0		28.0		28.0						
LOS:	С		С		В		В						
LOS #:	3				2								
Weighted Average LOS:	3.4		3.4		2.0		2.0						
Capacity:	2,800		2,800		6,000		6,000						
	المداانة	a. A 1 D	200	D 4 F 5	· r /								
I	LOS codin	g: A = T, B	i = 2, C = 3,	D = 4, E = 5	o, F = 6								

		F	irst Segment Gr	owth Rates	
	A	na Ammural Daile	Tuoffic	Domont	Doub(s) of Future to subjet the
	2000	ge Annual Daily 2020	Change	Percent Change	Port(s) of Entry to which the Highway is Connected
Segment 1 of Highways	Directly Conne	ected to the Lan	nd Ports of Entry		
MX-40	7,315	23,196	15,881	217.1%	Reynosa
MX-85	7,844	15,851	8,007	102.1%	Nuevo Laredo
MX-97	3,072	9,100	6,028	196.2%	Reynosa
MX-180	3,950	7,860	3,910	99.0%	Matamoros
MX-sin num.	2,446	5,108	2,662	108.8%	Camargo
Total:	24,627	61,115	36,488	148.2%	
Notes:					
The AATD shown abo	ove is the value for	the first segment	of each of the highwa	iys for calendar year 2000 a	and projections for 2020. The
	nce between the to	wo numbers, and the	he percent change is o	calculated by dividing the c	difference by the AADT for
calendar year 2000.					
All of these highways	are directly conne	ected to the Land P	orts of Entry, and the	Mexico-US border.	
The total growth rate	of 148.2% is the	growth rate that is	used to calculate the	2020 border crossings of p	assenger vehicles and buses.
<del>-</del>				<u> </u>	
Source:					
Tamaulipas BINS Te	echnical Commit	tee representativ	re		

					The Ma	atamoros	Corridor:	Calenda	r Year 200	00 Data				
				MX-2							MX-180			
		0 km of the		o Border?	Υ				00 km of the		o Border?	Υ		
	Serves an	Internation	nal POE?		Υ			Serves an	Internatio	nal POE?		Υ		
Seg-	Begin	End		Avg Ann	Level of	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
												_		
1	0.000	37.000	37.000	4,512	С	3	2,000	0.000	26.000	26.000	4,887	Α	1	2,800
2	37.000	76.000	39.000	9,121	С	3	2,800	26.000	59.000	33.000	4,121	A	1	2,800
3								59.000	81.000	22.000	3,965	В	2	2,800
4								81.000	112.000	31.000	6,215	В	2	2,800
5								112.000	139.000	27.000	6,317	В	2	2,800
6								139.000	185.000	46.000	4,977	С	3	2,800
7								185.000	271.000	86.000	2,400	В	2	2,000
8								271.000	300.250	29.250	2,275	В	2	2,000
9								300.250	347.500	47.250	2,415	В	2	2,000
10								347.500	380.500	33.000	2,872	В	2	2,000
11								380.500	416.500	36.000	3,950	В	2	2,000
		Sum	76.000	13,633		6	4,800		Sum	416.500	44,394		21	26,800
		E	Estimating	the Weighte	ed Average	es for MX-	2		E	stimating t	he Weighted	d Averages	for MX-1	80
		Segment	Weight	AADT		Service	Capacity		Segment		AADT	Level of		Capacity
		1	48.7%	2,197		1.461	974		1	6.2%	305		0.062	175
		2	51.3%	4,681		1.539	1,437		2	7.9%	327		0.079	222
		_		1,7001			.,,,,,,,		3	5.3%	209		0.106	148
									4	7.4%	463		0.149	208
									5	6.5%	410		0.130	182
									6	11.0%	550		0.331	309
									7	20.6%	496		0.413	413
									8	7.0%	160		0.140	140
									9	11.3%	274		0.227	227
									10	7.9%	228		0.158	158
									11	8.6%	341		0.173	173
		Sum	100.0%	6,877	С	3.000	2,411		Sum	100.0%	3,761	Α	1.969	2,355
		LOS coding	j: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	6								
	Source:	Tamaulinas F	INS Technics	al Committee re	nresentative									
	Journe.	ramaunpas L	mas recitifica	a. 50mmmttee 16	prosentative	I	1		1					

					The Ma	atamoros	Corridor:	Calenda	r Year 202	0 Data				
				MX-2							MX-180			
,	Within 10	0 km of the	e US-Mexic	o Border?	Υ			Within 10	00 km of the	e US-Mexic	o Border?	Υ		
		Internation			Υ				Internatio			Υ		
Seg-	Begin	End		Avg Ann	Lovelo	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Sorvico	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
1	0.000	37.000	37.000	8,102	В	2	4,000	0.000	26.000	26.000	9,724	Λ	1	6,000
2	37.000	76.000	39.000	22,166	В	2	4,000	26.000	59.000	33.000	8,200	A	<u> </u>	6,000
3	37.000	76.000	39.000	22,100	D	2	4,000	59.000	81.000	22.000	7,890	A	1	6,000
4								81.000	112.000	31.000	12,367	A	<u> </u>	6,000
5								112.000	139.000	27.000	12,569	A	1	6,000
6								139.000	185.000	46.000	9,903	В	2	6,000
7								185.000	271.000	86.000	4,775	В	2	4,000
8								271.000	300.250	29.250	4,527	В	2	4,000
9								300.250	347.500	47.250	4,805	В	2	4,000
10								347.500	380.500	33.000	5,715	В	2	4,000
11								380.500	416.500	36.000	7,860	В	2	4,000
		Sum	76.000	30,268		4	8,000		Sum		88,335		17	56,000
				•			,				· · · · · · · · · · · · · · · · · · ·			,
		E	Estimating	the Weighte	ed Average	es for MX-	2		E:	stimating t	he Weighted	d Averages	for MX-1	80
		Segment	Weight	AADT		f Service	Capacity		Segment	Weight	AADT	Level of		Capacity
		1	48.7%	3,944		0.974	1,947		1	6.2%	607		0.062	375
		2	51.3%	11,375		1.026	2,053		2	7.9%	650		0.079	475
		_	01.070	11/010					3	5.3%	417		0.053	317
									4	7.4%	920		0.074	447
									5	6.5%	815		0.065	389
									6	11.0%	1,094		0.221	663
									7	20.6%	986		0.413	826
									8	7.0%	318		0.140	281
									9	11.3%	545		0.227	454
									10	7.9%	453		0.158	317
									11	8.6%	679		0.173	346
		Sum	100.0%	15,319	В	2.000	4,000		Sum	100.0%	7,484	Α	1.666	4,888
		LOS codino	j: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	: 6								
		Ĭ	<u>, , , , , , , , , , , , , , , , , , , </u>											
	Source:	Tamaulipas B	BINS Technica	al Committee re	presentative									

						The	Nuevo Pro	greso Co	rridor					
			MX-2 fo	r Calendar Ye	ear 2000					MX-2 fo	r Calendar Y	ear 2020		
	Within 10	00 km of the	US-Mexic	o Border?	Υ			Within 10	00 km of the	e US-Mexic	o Border?	Υ		
		Internation			Y				Internatio		22.00	Υ		
Seg-	Begin	End		Avg Ann		f Service	Peak Hr	Begin	End		Avg Ann	Level of		Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
1														
2														+
3	76.000	94.000	18.000	7,189	С	3	2,800	76.000	94.000	18.000	17,471	В	2	6,000
4	94.000	104.000	10.000	10,272	D	4	2,800	94.000	104.000	10.000	24,964	В	2	6,000
		Sum	28.000	17,461		7	5,600		Sum	28.000	42,435		4	12,000
						Estim	ating the V	Veighted <i>F</i>	Averages fo	r MX-2				
				Calendar Y	ear 2000						Calendar Y	ear 2020		
		C	\A/a:-b+			f Camilaa	Compositor		Commont	\\\\a:=b+			Comples	Compositor
		Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
		1							1					
		2							2					+
		3	64.3%	4,622		1.929	1,800		3	64.3%	11,231		1.286	3,857
		4	35.7%	3,669		1.429	1,000		4	35.7%	8,916		0.714	2,143
		Sum	100.0%	8,290	С	3.357	2,800		Sum	100.0%	20,147	В	2.000	6,000
		LOS coding	: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	6								
	Source:	Tamaulipas B	INS Technica	al Committee rep	presentative									

				MX-2							MX-40			
	Within 10	0 km of the	a IIS-Mavic	n Rorder?	Υ			Within 10	0 km of the	a IIS-Mavic	o Border?	Υ		
		Internation		o border:	Y				Internatio		o border:	Y		
	Jei ves aii	Internatio	ilai i OL:		•			Jei ves aii	Internatio	ilai i OL:				
Seg-	Begin	End		Avg Ann	Level of	f Service	Peak Hr	Begin	End		Avg Ann	Level of	f Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
1								0.000	19.100	19.100	23,285	В	2	4,000
2								19.100	33.000	13.900	21,741	E	5	4,000
3								33.000	68.780	35.780	11,414	D	4	4,000
4								68.780	86.400	17.620	6,718	С	3	4,000
5	104.000	122.650	18.650	15,765	Α	1	4,000	86.400	113.000	26.600	6,660	С	3	4,000
6	122.650	135.000	12.350	16,897	В	2	4,000	113.000	125.000	12.000	7,010	С	3	4,000
7	135.000	170.680	35.680	7,080	С	3	2,800	125.000	161.900	36.900	6,980	D	4	4,000
8								161.900	192.000	30.100	6,972	Α	1	4,000
9								192.000	225.000	33.000	7,315	Α	1	4,000
		Sum	66.680	39,742		6	10,800		Sum	225.000	98,095		26	36,000
											,			
		E	Stimating	the Weighte	d Average	s for MX1	0		E	stimating	the Weighte	d Average	s for MX-4	10
		Segment	Weight	AADT	Level of	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
		4								0.507	4.077		0.470	0.40
		1							1	8.5%	1,977		0.170	340
		2							2	6.2%	1,343		0.309	247
		3							3	15.9% 7.8%	1,815 526		0.636	636 313
		4	28.0%	4.400		0.200	1 110		4		787		0.235	
		5 6	18.5%	4,409 3,130		0.280 0.370	1,119 741		5 6	11.8% 5.3%	374		0.355 0.160	473 213
		7	53.5%	3,788		1.605	1,498		7	16.4%	1,145		0.656	656
		1	33.370	3,700		1.003	1,470		8	13.4%	933		0.036	535
									9	14.7%	1,073		0.134	587
									,	17.770	1,073		0.147	307
		Sum	100.0%	11,327	В	2.255	3,358		Sum	100.0%	9,972	В	2.801	4,000
				-										
		LOS coding	g: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	6								

					The R	evnosa (	Corridor: Cale	ndar Vear 20	00 Data		
					1110 1	l cyriosa v	Joiridor. Gaic	Tidai Teai 20	Data		
				MX-97							
		0 km of the		o Border?	Υ						
	Serves an	Internatio	nal POE?		Υ						
_											
Seg-	Begin	End		Avg Ann		Service	Peak Hr				
ment	Post	Post	Length	Daily	A to	1 to	Traffic				
#	km	km	km	Traffic	F	6	Capacity				
1	0.000	115.100	115.100	3,072	В	2	2,800				
2											
3											
4											
5											
6 7											
8											
9											
,											
		Sum	115.100	3,072		2	2,800				
						C . B. #3/					
		E	stimating	the Weighte	d Average	S for IVIX-	97				
		Segment	Weight	AADT	Level of	Service	Capacity				
		Segment	weight	AADI	Level O	Jei Vice	Capacity				
		1	100.0%	3,072		2.000	2,800				
			1001070	0,0.2		2.000	27000				
		Sum	100.0%	3,072	В	2.000	2,800				
		Julii	100.0%	3,012	D	2.000	2,600				
		LOS codino	n: A = 1 R =	= 2, C = 3, D =	4. F = 5. F =	6					
			g. 7. 1, D -	_, 0 0, 0 -	., _ 0,					1	
	Source:	Tamaulipas F	BINS Technica	I Committee re	presentative						

					The F	Reynosa (	Corridor: (	Calendar	Year 2020	Data				
				MX-2							MX-40			
	Within 10	0 km of the	e US-Mexic	o Border?	Υ			Within 10	00 km of the	e US-Mexic	o Border?	Υ		
		Internatio		2 20: 40: 1	Y				Internatio		2010011	Υ		
Seg-	Begin	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level o	f Service	Peak Hi
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacit
1								0.000	19.100	19.100	73,837	Α	1	8,000
2								19.100	33.000	13.900	68,941	A	1	8,000
3								33.000	68.780	35.780			1	8,000
4								68.780	86.400	17.620	36,194 21,303	<u>А</u> В	2	6,000
5	104.000	122.650	18.650	20 212	Λ	1	9,000	86.400	113.000	26.600		В	2	6,000
6	122.650	135.000	12.350	38,313 41,064	A A	1 1	8,000 8,000	113.000	125.000	12.000	21,119 22,229	В В	2	6,000
7	135.000	170.680	35.680	14,784	B B	2	6,000	125.000	161.900	36.900	22,229	В	2	8,000
8	133.000	170.000	33.000	14,704	D	2	0,000	161.900	192.000	30.100	22,134	A	1	8,000
9								192.000	225.000	33.000	23,196	A	1	8,000
9								192.000	223.000	33.000	23,190	Α	I	8,000
		Sum	66.680	94,161		4	22,000		Sum	225.000	311,061		13	66,000
			Estimatina	the Weighte	d Aversa	os for MV	2			ctimating	the Weighte	d Averege	s for MV	10
			Estimating	the weighte	u Averag	es ioi iviv-	· <b>Z</b>			Sumating	the weighte	u Average	25 101 IVIA-2	+0
		Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level o	f Service	Capacity
		1							1	8.5%	6,268		0.085	679
		2							2	6.2%	4,259		0.062	494
		3							3	15.9%	5,756		0.159	1,272
		4							4	7.8%	1,668		0.157	470
		5	28.0%	10,716		0.280	2,238		5	11.8%	2,497		0.236	709
		6	18.5%	7,606		0.185	1,482		6	5.3%	1,186		0.107	320
		7	53.5%	7,911		1.070	3,211		7	16.4%	3,630		0.328	1,312
									8	13.4%	2,958		0.134	1,070
									9	14.7%	3,402		0.147	1,173
		Sum	100.0%	26,232	Α	1.535	6,930		Sum	100.0%	31,623	Α	1.414	7,500
		LOS coding	g: A = 1, B =	= 2, C = 3, D = 4	4, E = 5, F =	= 6								
	Source:	Tamaulipas E	BINS Technica	ıl Committee rep	oresentative	:								

					The F	Pevnosa (	Corridor: Calen	dar Year 2020 Data		
					IIIC I	l cyriosa (	Joiridor. Galeri	dai Tcai 2020 Data		
				MX-97						
	Within 10	0 km of the	e US-Mexic	o Border?	Υ					
		Internatio			Υ					
Co	Domin	End		Av Ann	Lovelet	F Comileo	Peak Hr			
Seg- ment	Begin Post	Post	Length	Avg Ann Daily	A to	f Service 1 to	Traffic			
#	km	km	km	Traffic	F	6	Capacity			
π	KIII	KIII	KIII	Haine	•		Capacity			
1	0.000	115.100	115.100	9,100	Α	1	8,000			
2				.,			2,222			
3										
4										
5										
6										
7										
8										
9										
		Sum	115.100	9,100		1	8,000			
				,			-,			
		E	stimating	the Weighte	d Average	s for MX-	97			
		Segment	Weight	AADT	Level of	Service	Capacity			
		1	100.0%	9,100		1.000	8,000			
		Sum	100.0%	9,100	Α	1.000	8,000			
			.00.070	7,100			3,000			
		LOS codino	g: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	6				
					,					
	Source:	Tamaulipas I	BINS Technica	I Committee re	presentative					

					The C	amargo	Corridor:	Calendar	Year 2000	) Data		T		1
				MX-2							MX-sin num.			
				IVIX-Z							VIX-3III IIGIII.			
	Within 10	0 km of the	IIS-Mexic	n Border?	Υ			Within 10	0 km of the	e IIS-Mevic	o Border?	Υ		
		Internation		o border.	Y				Internatio		o border.	Y		
	oci ves un	Internation	idi i OL.		•			oci ves un		nai i oz.		•		
Seg-	Begin	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Service	Peak H
ment		Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacit
1								0.000	30.000	30.000	2,277	С	3	2,800
2								30.000	40.000	10.000	2,016	C	3	2,800
3								40.000	65.000	25.000	2,446	С	3	2,800
4														
5														
6														
7														
8	170.680	198.400	27.720	4,268	В	2	2,800							
9	198.400	222.770	24.370	6,214	С	3	2,800							
		<b>C</b>	F0 000	10 100			F (00		C	/F 000	/ 700			0.400
		Sum	52.090	10,482		5	5,600		Sum	65.000	6,739		9	8,400
		E	stimating	the Weighte	ed Average	es for MX	-2		Esti	mating the	Weighted A	verages fo	r MX-sin	num.
		Segment		AADT		f Service	Capacity		Segment		AADT		Service	Capacity
		1							1	46.2%	1,051		1.385	1,292
		2							2	15.4%	310		0.462	431
		3							3	38.5%	941		1.154	1,077
		4												
		5												
		6												
		7												
-		8	53.2%	2,271		1.064	1,490							
		9	46.8%	2,907		1.404	1,310							
		Sum	100.0%	5,178	В	2.468	2,800		Sum	100.0%	2,302	С	3.000	2,800
		LOS coding	: A = 1. B =	= 2, C = 3, D =	4, E = 5. F =	= 6								
			.,	,, -	1:									1
	Source:	Tamaulipas B	INS Technica	al Committee re	presentative									

				I	The C	amargo	Corridor:	Calendar	Year 2020	) Data		T	T	
				MX-2							MX-sin num.			
				IVIA-Z							VIX-SIII HUIH.			
	Within 10	0 km of the	LIS-Mavio	n Border?	Υ			Within 10	0 km of the	a IIS-Mavic	o Border?	Υ		
		Internation		o border:	Y				Internatio		o border:	Y		
	Jei ves aii	Internation	iai i OL:		•			Serves arr	Internatio	nai i OL:		•		
Seg-	Begin	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level of	f Service	Peak Hr
ment		Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
1								0.000	30.000	30.000	4,755	Α	1	6,000
2								30.000	40.000	10.000	4,210	A	1	6,000
3								40.000	65.000	25.000	5,108	Α	1	6,000
4														
5														
6														
7														
8	170.680	198.400	27.720	8,912	Α	1	6,000							
9	198.400	222.770	24.370	12,976	В	2	4,000							
		Sum	52.090	21,888		3	10,000		Sum	65.000	14,073		3	18,000
		E	stimating	the Weighte	ed Average	es for MX	-2		Esti	mating the	Weighted A	verages fo	or MX-sin	num.
		Segment		AADT		f Service	Capacity		Segment		AADT		Service	Capacity
		1							1	46.2%	2,195		0.462	2,769
		2							2	15.4%	648		0.154	923
		3							3	38.5%	1,965		0.385	2,308
		4							4		,			,
		5							5					
		6							6					
		7							7					
		8	53.2%	4,743		0.532	3,193		8					
		9	46.8%	6,071		0.936	1,871		9					
									10					
		Sum	100.0%	10,813	Α	1.468	5,064		Sum	100.0%	4,807	Α	1.000	6,000
		LOS coding	: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	6								
		Ĭ												
	Source:	Tamaulipas B	INS Technica	al Committee re	presentative									

					The Mig	uel Alem	án Corrido	or: Calend	dar Year 2	000 Data				
				MX-2							MX-54			
	Within 10	0 km of the	us-Mexic	o Border?	Υ			Within 10	00 km of the	e US-Mexic	o Border?	Υ		
		Internation			Y				Internatio		2 20.00	Υ		
,														
Seg-	Begin Post	End Post	Length	Avg Ann Daily	A to	f Service 1 to	Peak Hr Traffic	Begin Post	End Post	Length	Avg Ann Daily	Level of A to	1 to	Peak Hr Traffic
ment #	km	km	km	Traffic	F	6	Capacity		km	km	Traffic	F	6	Capacity
#	KIII	KIII	KIII	Папіс	<u>F</u>	0	Capacity					Г	0	Capacity
1								0.000	19.120	19.120	17,311	В	2	2,800
2								19.120	21.300	2.180	17,355	С	3	2,800
3								21.300	28.150	6.850	30,144	С	3	2,800
4								28.150	38.100	9.950	5,694	С	3	2,800
5								38.100	74.100	36.000	5,287	С	3	2,800
6								74.100	95.950	21.850	2,742	В	2	2,800
7								95.950	115.800	19.850	3,450	В	2	2,800
8								115.800	132.800	17.000	3,080	В	2	2,800
9								132.800	156.210	23.410	3,021	В	2	2,800
10	222.770	237.350	14.580	3,030	С	3	2,800							
		Sum	14.580	3,030		3	2,800		Sum	156.210	88,084		22	25,200
		E	stimating	the Weighte	d Average	es for MX-	2		E	stimating	the Weighte	d Average:	s for MX-	54
		Segment	Weight	AADT		f Service	Capacity		Segment		AADT	Level of		Capacity
		1							1	12.2%	2,119		0.245	343
		2							2	1.4%	242		0.042	39
		3							3	4.4%	1,322		0.132	123
		4							4	6.4%	363		0.191	178
		5							5	23.0%	1,218		0.691	645
		6							6	14.0%	384		0.280	392
		7							7	12.7%	438		0.254	356
		8							8	10.9%	335		0.218	305
		9							9	15.0%	453		0.300	420
		10	100.0%	3,030		3.000	2,800							
		Sum	100.0%	3,030	С	3.000	2,800		Sum	100.0%	6,874	В	2.352	2,800
		LOS coding	: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	6								1
	Source:	Tamaulipas B	INS Technica	al Committee rep	oresentative									

					The Mig	uel Alem	án Corrido	or: Calend	dar Year 2	020 Data			I	
				MX-2							MX-54			
	Within 10	0 km of the	US-Mexic	o Border?	Υ			Within 10	00 km of the	e US-Mexic	o Border?	Υ		
		Internation		Dorder.	Y				Internatio		o border.	Y		
Seg-	Begin	End		Avg Ann		f Service	Peak Hr	Begin	End		Avg Ann		Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
1								0.000	19.120	19.120	38,965	Α	1	8,000
2								19.120	21.300	2.180	39,064	Α	1	8,000
3								21.300	28.150	6.850	67,850	Α	1	8,000
4								28.150	38.100	9.950	12,816	В	2	6,000
5								38.100	74.100	36.000	11,900	В	2	6,000
6								74.100	95.950	21.850	6,172	В	2	6,000
7								95.950	115.800	19.850	7,766	В	2	6,000
8								115.800	132.800	17.000	6,933	В	2	6,000
9								132.800	156.210	23.410	6,800	В	2	6,000
10	222.770	237.350	14.580	6,327	В	2	6,000							
		Sum	14.580	6,327		2	6,000		Sum	156.210	198,266		15	60,000
		E	stimating	the Weighte	ed Average	es for MX-	·2		E	stimating	the Weighte	d Average	s for MX-	54
		Segment	Weight	AADT	Level o	f Service	Capacity		Segment	Weight	AADT	Level of	Service	Capacity
		1							1	12.2%	4,769		0.122	979
		2							2	1.4%	545		0.014	112
		3							3	4.4%	2,975		0.044	351
		4							4	6.4%	816		0.127	382
		5							5	23.0%	2,742		0.461	1,383
		6							6	14.0%	863		0.280	839
		7							7	12.7%	987		0.254	762
		8							8	10.9%	755		0.218	653
		9							9	15.0%	1,019		0.300	899
		10	100.0%	6,327		2.000	6,000							
		Sum	100.0%	6,327	В	2.000	6,000		Sum	100.0%	15,472	Α	1.820	6,360
		LOS coding	: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	= 6								
		Ĭ												
	Source:	Tamaulipas B	INS Technica	al Committee rej	oresentative									

					The Nue	vo Lared	o Corrido	r: Calend	ar Year 20	000 Data		I	I	
				MX-2							MX-85			
	Within 10	0 km of the	e US-Mexic		Υ			Within 10	0 km of the	e US-Mexic		Υ		
		Internatio			Y				Internatio			Y		
					-							-		
Seg-	Begin	End		Avg Ann	Level o	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
1								0.000	12.100	12.100	11,775	Α	1	4,000
2								12.100	16.000	3.900	8,390	Α	1	4,000
3								16.000	20.190	4.190	7,781	Α	1	4,000
4								20.190	32.000	11.810	6,602	Α	1	4,000
5								32.000	78.230	46.230	8,894	D	4	2,000
6								78.230	98.900	20.670	6,324	С	3	2,800
7								98.900	124.400	25.500	6,123	С	3	2,800
8								124.400	156.800	32.400	4,457	С	3	2,800
9								156.800	184.560	27.760	8,065	Α	1	4,000
10								184.560	205.900	21.340	6,475	Α	1	4,000
11	237.350	257.670	20.320	2,865	В	2	2,800	205.900	228.000	22.100	7,844	Α	1	4,000
12	257.670	340.500	82.830	969	В	2	2,800							
13	340.500	356.080	15.580	2,986	В	2	2,800							
		Sum	118.730	6,820		6	8,400		Sum	228.000	82,730		20	38,400

			1		The Nue	vo Lared	o Corrido	r: Calend	ar Year 20	20 Data			T	
				MX-2							MX-85			
	Within 10	0 km of the	e US-Mexic		Υ			Within 10	0 km of the	e US-Mexic		Υ		
		Internatio			Υ				Internatio			Y		
Seg-	Begin	End		Avg Ann	Level of	f Service	Peak Hr	Begin	End		Avg Ann	Level of	Service	Peak Hr
ment	Post	Post	Length	Daily	A to	1 to	Traffic	Post	Post	Length	Daily	A to	1 to	Traffic
#	km	km	km	Traffic	F	6	Capacity	km	km	km	Traffic	F	6	Capacity
1								0.000	12.100	12.100	23,795	А	1	8,000
2								12.100	16.000	3.900	16,954	Α	1	8,000
3								16.000	20.190	4.190	15,724	Α	1	8,000
4								20.190	32.000	11.810	13,341	Α	1	8,000
5								32.000	78.230	46.230	17,973	В	2	6,000
6								78.230	98.900	20.670	12,779	В	2	6,000
7								98.900	124.400	25.500	12,373	В	2	6,000
8								124.400	156.800	32.400	9,007	В	2	6,000
9								156.800	184.560	27.760	16,298	Α	1	8,000
10								184.560	205.900	21.340	13,085	Α	1	8,000
11	237.350	257.670	20.320	5,983	В	2	4,000	205.900	228.000	22.100	15,851	Α	1	8,000
12	257.670	340.500	82.830	2,024	В	2	4,000				·			
13	340.500	356.080	15.580	6,235	В	2	4,000				·			
		Sum	118.730	14,242		6	12,000		Sum	228.000	167,180		15	80,000

				ine Nue	evo Lared	io Corridor: Ca	lendar Year 20	DUU Data						
		Estimating	the Weight	│ ed Average	es for MX	.2	E	Estimating the Weighted Averages for MX-85						
	Segment	Segment Weight AADT		Level of Service		Capacity	Segment	Weight	AADT	Level of Service	Capacit			
	1	_					1	5.3%	625	0.053	212			
	2						2	1.7%	144	0.017	68			
	3						3	1.8%	143	0.018	74			
	4						4	5.2%	342	0.052	207			
	5						5	20.3%	1,803	0.811	406			
	6						6	9.1%	573	0.272	254			
	7						7	11.2%	685	0.336	313			
	8						8	14.2%	633	0.426	398			
	9						9	12.2%	982	0.122	487			
	10						10	9.4%	606	0.094	374			
	11	17.1%	490		0.342	479	11	9.7%	760	0.097	388			
	12	69.8%	676		1.395	1,953								
	13	13.1%	392		0.262	367								
	Sum	100.0%	1,558	В	2.000	2,800	Sum	100.0%	7,297	B 2.298	3,181			
	LOS coding	g: A = 1, B =	= 2, C = 3, D =	4, E = 5, F =	: 6									
Source:			Il Committee re		1									

	E	Estimating	the Weight	ed Average	es for MX-	2	Estimating the Weighted Averages for MX-85							
	Segment	Weight	AADT	1	f Service	Capacity	Segment	Weight	AADT	Level of Service	Capacity			
	1						1	5.3%	1,263	0.053	425			
	2						2	1.7%	290	0.017	137			
	3						3	1.8%	289	0.018	147			
	4						4	5.2%	691	0.052	414			
	5						5	20.3%	3,644	0.406	1,217			
	6						6	9.1%	1,159	0.181	544			
	7						7	11.2%	1,384	0.224	671			
	8						8	14.2%	1,280	0.284	853			
	9						9	12.2%	1,984	0.122	974			
	10						10	9.4%	1,225	0.094	749			
	11	17.1%	1,024		0.342	685	11	9.7%	1,536	0.097	775			
	12	69.8%	1,412		1.395	2,791								
	13	13.1%	818		0.262	525								
	Sum	100.0%	3,254	В	2.000	4,000	Sum	100.0%	14,745	A 1.547	6,905			
	LOS coding	j: A = 1, B =	: 2, C = 3, D =	4, E = 5, F =	= 6									
Source:			I Committee re		1									

	Level	of Service Lo	ok Up Table						
	LOS	Number							
	Α	1							
	В	2							
	С	3							
	D	4							
	E	5							
	F	6							
Note:	This table has two								
	1. The first purp	S.							
	The LOS is provided by the State and is in the form of a								
	letter, such as								
	converted to r								
	A=1, B=2, C=3	, D=4, E=5, F=6							
	<ol><li>The second present pre</li></ol>								
	calculations to								
	average is con								
	The letters ass	wing:							
	A = 1.000								
	B = 2.000								
	C = 3.000 D = 4.000								
	D = 4.000 E = 5.000								
	F = 6.000								
	Γ = 0.000								

# CORRIDOR EVALUATION TEXAS RESULTS AND DATA

Corridor evaluations are conducted to determine the corridors with the greater needs. This corridor evaluation uses quantifiable data with a systematic method to evaluate transportation corridors. Corridors are combinations of modes that move people, vehicles and goods from one location to another. To facilitate the evaluation process, the computations are calculated in formulas contained in the spreadsheets that will be sent to each of the states. Each evaluation spreadsheet is tailored to each state, thus each state's evaluation spreadsheet contains unique data – even though the methodology is the same. It is envisioned that each state will use its spreadsheet to conduct corridor evaluations, at its discretion.

Overall, the evaluation is conducted by compiling data, allocating the data to corridors and comparing corridors [within a state] to one another. There are 16 indicators<sup>1</sup> for which we compile data for each corridor. The overall evaluation uses two broad categories of data:

- 1. Historical Data data for 16 indicators for the year 2000.
- 2. Change Data a combination of actual changes for the 16 indicators from 2000 to 2020 and percent changes for the same 16 indicators from 2000 to 2020.

Conducting the evaluations is based on the ordering of data from highest to lowest to determine need. For example, assume there are three corridors in a state and the Average Annual Daily Traffic [AADT] in Corridor A is 157,000, the AADT for Corridor B is 450,000 and the AADT for Corridor C is 30,000. In this example, Corridor B is listed first because it has the highest AADT [450,000], its evaluation results are one, and it has the highest need. Corridor A is listed second because its AADT is 157,000 [second highest], its evaluation results are two, and it has the second highest need. Corridor C is listed third because it has the lowest AADT [30,000], its evaluation results are three and it has the lowest need. This process is repeated for all 16 indicators with data for calendar year 2000, for all 16 indicators for the change in the data between 2000 and 2020, and all 16 indicators for the percent change in the data between 2000 and 2020. There are a total of 48 evaluations compiled if all the data are present.

Higher values for the indicators represent more traffic (AADT), more congestion (LOS), more trade (dollar value of air, maritime, rail and truck cargo across POEs), more vehicles (number of passenger vehicles, trucks, buses, and rail cars across a POE), which point to both the relative importance of the corridor and its infrastructure needs. The highest value is given "first place" or a score of one and represents the highest need.

The evaluation results are summed by mode. For example, there are four indicators for highways – AADT, the highway length [in miles], the level of service [LOS] and the highway capacity at peak hours. If a corridor was listed first for each indicator, its highway score would be a four [a score of

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<sup>&</sup>lt;sup>1</sup> In some cases there will be fewer than 16 indicators. For example, some states do not have maritime ports so maritime data will not be included in the evaluation.

one for each indicator]. This is done for Land Ports of Entry [POE – five indicators], airports [one indicator], maritime ports [two indicators] and railroads [four indicators]. The lower the score, the higher the listing. It follows that the lowest mode score represents the corridor with the greatest need for that mode.

The overall score for each corridor is then calculated by summing the five modes scores [one each for highways, POE, airports, maritime ports and railroads]. The corridor with the lowest overall score is listed first and has the highest overall need. The corridor with the second lowest overall score is listed second and has the second highest need. The corridor with the highest overall score is listed third and has the lowest overall need.

Recall there is one historical component and there are two change components (change in absolute terms and percent change). Without any adjustments, the change component has twice the impact on the final result as the historical data. It was decided that the historical values are as important as the projected changes. To accomplish equal weighting, the historical scores are multiplied by two.

#### GENERAL DESCRIPTION OF TEXAS' CORRIDORS

#### Corridors

Texas has identified six corridors for the study and they are called the IH-10 Corridor, the IH-35 Corridor, the IH-69 Corridor, the U.S. 83 Corridor, the La Entrada al Pacifico Corridor and the Ports to Plains Corridor.

#### **Highways**

The IH-10 Corridor is composed of five highways: I-10, I-110, US-62, US-85 & US Loop 375. The IH-35 Corridor is composed of three highways: I-35, US-90 and State Spur [SS] 20. The IH-69 Corridor is composed of four highways: US-59, US-77, US-281 and State-359 [S-359]. The U.S. 83 Corridor is composed of two highways: US-83 and SS-200/Business 83. The La Entrada Corridor is composed of one highway: US-67. The Ports to Plains Corridor is composed of three highways: US-57, US-83 and US-277. No data on Level of Service [LOS] or capacity is provided. Therefore, the level of current or future congestion on Texas highways cannot be established.

#### **Land Ports of Entry [POE]**

The Texas BINS Technical Committee representative provided data on 26 POEs which include bridges, one dam, and one ferry on the US-Mexico border, in Texas. Trucks crossed at 14 of the POEs while passenger vehicles and buses crossed at 24 POEs. No passenger vehicle or buses cross at Stanton and Word Trade Bridge. In calendar year 2000, about 2.9 million trucks crossed into Texas through the 14 POEs and transported about 13.6 million tons of goods valued at about \$62.3 billion. In addition, about 50 million passenger vehicles and buses entered Texas through the 24 POEs. Texas envisions that the number of passenger vehicles and buses entering through its POEs will increase about 192% to 79.6 million in 2020.

# **Airports**

There are eight airports in Texas that meet the minimum corridor evaluation criteria [located within 100 km of the US-Mexico border and designated as an international port of entry]. In calendar year 2000 about 671,000 tons of goods were transported at four of the eight airports. The airport with the longest runway was El Paso International Airport with a runway length of just over 11,000 feet. In addition, El Paso International Airport transported more goods than the other airports with about 319,000 tons of goods - or nearly 47% of the total.

#### Railroads

There are a number of railroads in Texas that operate within 100 km of the US-Mexico border. However, the Burlington Northern Santa Fe [BNSF], the Union Pacific [UP], and the Tex Mex are the only railroads that transport goods from the land POEs. Of the 26 POEs, rail crossings occur at four POEs: Eagle Pass II, El Paso - Santa Fe, Laredo II, and Brownsville B&M.

The BNSF operates in the IH-10 Corridor and interchanges with Ferrocarril Mexicano at the El Paso - Santa Fe POE. In calendar year 2000, BNSF transported about 673,000 tons of goods from this POE.

The UP operates in four corridors: The Ports to Plains, the IH-10, IH-35 and IH-69. UP interchanges with Transportacion Ferroviaria Mexicana [TFM] at the Laredo II POE; UP interchanges with TFM at the Brownsville B&M POE; and UP interchanges with Ferromex at the Eagle Pass II POE. In calendar year 2000, UP transported about 4.8 million tons of goods from these three POE worth about \$18 billion. Since no railroads operate in the La Entrada and U.S. 83 Corridors, there are no data for those corridors.

The Tex Mex railroad interchanges with TFM at the Laredo II POE.

In 2004, the Presidio POE rail crossing is anticipated to reopen and may potentially affect rail traffic at the El Paso POE.

#### **Maritime Ports**

Texas has one maritime port that meets the minimum corridor evaluation criteria [within 100 km of the US-Mexico border and designated as an international port of entry]. That port is located at Brownsville.

In calendar year 2000, about 5.25 million tons of goods and no containers were moved through the Brownsville Maritime Port. Texas envisions substantial growth in the Brownsville Maritime Port with goods shipped projected to increase to 10 million tons in 2020. In addition, it is envisioned that Brownsville Maritime Port will be handling container traffic in 2020.

**Source:** Texas BINS Technical Committee representative.

#### **ANALYSIS OF CORRIDOR EVALUATION RESULTS**

The IH-10 Corridor is listed first. The IH-69 Corridor is listed second. The IH-35 Corridor is listed third. The U.S. 83 Corridor is listed fourth. The Ports to Plains Corridor is listed fifth. The La Entrada al Pacifico Corridor is listed last. The IH-10 Corridor obtains its first place listing by being listed first with respect to the historical data, and being listed first with respect to the change data.

#### **Historical Data**

This discussion reviews highway, land POE, airport, maritime port and rail data with their results. With regard to the highways, it should be remembered that level of service and peak capacity data are not available. Therefore, we do not have a sense of congestion that may occur on the highways. The IH-69 Corridor is listed first with regard to highways with a first place listing for highway length [262.3 miles] and second place listing for AADT [[49,514]. The IH-10 Corridor is listed first for AADT with 137,541 - almost three times larger than the IH-69 Corridor and 80 times larger than the La Entrada al Pacifico Corridor.

For truck and passenger vehicle data, airport data, and maritime port data, the IH-10 Corridor is always listed first by virtue of the fact that those data are allocated based on the distribution of AADT amongst the corridors [as noted above, IH-10 is listed first with respect to AADT]. For railroads, it is important to recall that only rail goods that cross the US-Mexico border are used in the evaluation and the BNSF and UP railroads transport goods from the POE. The IH-10 Corridor is listed first because the BNSF and UP railroads transport goods from the POE into this corridor, while three other corridors are tied for second because the UP is the only rail line that transports goods from the POE to these corridors. The La Entrada and U.S. 83 Corridors have no rail data and are tied for last.

#### Change Data

This discussion reviews highway, land POE, airport, maritime port and rail data for both absolute changes and percent changes. With regard to absolute changes in highway data, the IH-10 Corridor is listed first by virtue of the fact that it is listed first for AADT with an increase of 53,423. In addition, the IH-10 Corridor is tied for first for highway length with the other corridors as there is no change with regard to highway length.

For trucks and passenger vehicles, airport data, and maritime port data, the IH-10 Corridor is always listed first by virtue of the fact that the 2000 year data is larger than the other three corridors and all the corridors use the same growth rates. For railroad data, the IH-10 Corridor is listed first because it has the largest 2000 data and uses the same growth rate as the other corridors.

With regard to percent changes in highway data, the IH-35 Corridor is listed first by virtue of the fact that it is listed first in AADT growth [with 97.0%] and tied for first in growth of highway length with the other five corridors - where there was no change.

With data for trucks, passenger vehicles, airport and maritime port data, the six corridors are always tied for first by virtue of the fact that the growth rates are the same for each corridor. For railroad data, the four corridors that contain railroad data are tied for first because the growth rates are the same for each of the corridors.

Table 1
Summary Corridor Results

	Corridor Scores <sup>1</sup>								<b>Evaluation Results</b>					
	Α	В	С	D	E	F	Α	В	С	D	Ε	F		
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83								
Historical Data for 2000 <sup>2</sup>														
Highways	18	24	8	12	6	16	5	6	2	3	1	4		
Land Ports of Entry	40	48	8	32	16	24	5	6	1	4	2	3		
Airports <sup>3</sup>	10	12	2	8	4	6	5	6	1	4	2	3		
Maritime Ports <sup>4</sup>	12	14	4	10	6	8	5	6	1	4	2	3		
Railroads <sup>5</sup>	8	20	4	8	8	20	2	5	1	2	2	5		
Sum of Historical Scores:	88	118	26	70	40	74	5	6	1	3	2	4		
Changes Between 2000 and 20	)20 <sup>6</sup>													
Highways	9	13	9	6	8	9	3	6	3	1	2	3		
Land Ports of Entry	24	28	8	16	12	20	5	6	1	3	2	4		
Airports <sup>3</sup>	6	7	2	4	3	5	5	6	1	3	2	4		
Maritime Ports⁴	12	14	4	8	6	10	5	6	1	3	2	4		
Railroads <sup>5</sup>	6	20	4	6	6	20	2	5	1	2	2	5		
Sum of Change Scores:	57	82	27	40	35	64	4	6	1	3	2	5		
Overall Scores <sup>7</sup> :	145	200	53	110	75	138								
Overall Result:	5	6	1	3	2	4								

#### Notes:

- <sup>1</sup> The Corridor Scores are the Evaluation Results in Tables 2, 4 and 5.
- <sup>2</sup> Historical Scores from Table 2. To insure equal weighting with the Changes scores, the Historical corridor scores are multiplied by two.
- <sup>3</sup> Texas has eight airports within 100 km of the US-Mexico border that are designated as international ports of entry.
- <sup>4</sup> Texas has one maritime port located within 100 km of the US-Mexico border that is designated as an international port of entry.
- The evaluation is based on rail goods that cross the border at a land POE. The Burlington Northern Santa Fe and the Union Pacific railroads are the two rail companies that transport goods from the land POE in Texas. The allocation of rail goods to corridors is specified from the Part 2 and Part 5 questionnaires.
- The Changes Scores is the sum of the Corridor Scores from Table 4 [Corridor Changes] and the Corridor Scores from Table 5 [Corridor Percent Changes].
- The Overall Score is the sum of the Historical Score and the Changes Score. The Historical Data scores and the Changes Between 2000 and 2020 scores are equally weighted.

Lower Score represents greater need.

Table 2 Corridor Data For 2000

			Corridor	Raw Data				Eva	luatio	n Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	Е	F
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Highways												
Average Annual Daily Traffic	16,633	1,717	137,541	20,129	49,514	20,475	5	6	1	4	2	3
Highway Length [in km]	194.3	100.7	206.4	256.2	262.8	188.1	4	6	3	2	1	5
LOS [A=1 to F = 9]												
Capacity at Peak Hour												
				Highway S	Scores		9	12	4	6	3	8
				Overall High	ghway Resul	ts	5	6	2	3	1	4
Land Port of Entry Border Crossing												
Number trucks	196,640	20,293	1,626,015	237,965	585,360	242,058	5	6	1	4	2	3
Total volume [tons]	916,380	94,569	7,577,527	1,108,961	2,727,886	1,128,036	5	6	1	4	2	3
Value of goods Millions \$	\$4,207	\$434	\$34,786	\$5,091	\$12,523	\$5,178	5	6	1	4	2	3
# passenger vehicles & buses	3,390,557	349,901	28,036,448	4,103,098	10,093,032	4,173,673	5	6	1	4	2	3
				POE Score	s		20	24	4	16	8	12
				Overall PC	E Results		5	6	1	4	2	3
Airports												
Total volume [tons]	45,393	4,685	375,356	54,933	135,127	55,878	5	6	1	4	2	3
				Airport Sc	ores		5	6	1	4	2	3
				Overall Ai	rport Results		5	6	1	4	2	3
Maritime Ports												
Total volume [millions tons]	0.35	0.04	2.93	0.43	1.06	0.44	5	6	1	4	2	3
Total number TEUs	0	0	0	0	0	0	1	1	1	1	1	1
				Maritime	Port Score		6	7	2	5	3	4
				Overall Ma	aritime Resul	ts	5	6	1	4	2	3
	Corridor F	Raw Data					Eva	luati		sults		
	Α	В	С	D	E	F	Α	В	С	D	Ε	F

	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Railroads Border Crossing at POE <sup>1</sup>												
Number rail cars												
Total volume [tons]	1,189,423		1,862,731	1,189,423	1,189,423		2	5	1	2	2	5
Total Number TEUs												
Value of goods Millions \$	\$4,519.0		\$5,565.4	\$4,519.0	\$4,519.0		2	5	1	2	2	5
				Railroad S	cores		4	10	2	4	4	10
				Overall Ra	ilroad Resul	ts	2	5	1	2	2	5
Total AADT in Six Corridors		Sha	re of AADT	Among Corr	idors							
246,010	6.8%	0.7%	55.9%	8.2%	20.1%	8.3%						

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Historical data from Texas BINS Technical Committee Representative, see Tables 6 - 9 for details.

Lower Score represents greater need.

<sup>&</sup>lt;sup>1</sup> UP rail data are divided equally among four corridors: Ports to Plains, IH-10, IH-35 & IH-69. The BNSF rail data are allocated to the IH-10 Corridor assignments for the rail data are obtained from the Part 2 POE questionnaire submitted by the Texas BINS Technical Committee representative. Since no railroads operate in the La Entrada and US-83 Corridors, there are no data for those corridors.

Table 3
Corridor Data and Results for 2020

			Corridor	Raw Data				Eval	uatio	n Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	Е	F
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Highways												
Average Annual Daily Traffic	30,794	2,933	222,719	39,655	84,693	36,916	5	6	1	3	2	4
Highway Length [in km]	194.3	100.7	206.4	256.2	262.8	188.1	4	6	3	2	1	5
LOS [A=1 to F = 9]												
Capacity at Peak Hour												
				Highway S	Scores		9	12	4	5	3	9
				Overall Hi	ghway Resul	ts	5	6	2	3	1	4
Land Port of Entry Border Crossing												
Number trucks	343,051	32,677	2,481,109	441,765	943,486	411,242	5	6	1	3	2	4
Total volume [tons]	1,769,539	168,554	12,798,160	2,278,730	4,866,728	2,121,287	5	6	1	3	2	4
Value of goods Millions \$	\$13,384	\$1,275	\$96,803	\$17,236	\$36,811	\$16,045	5	6	1	3	2	4
# passenger vehicles & buses	5,883,652	560,437	42,553,402	7,576,693	16,181,690	7,053,200	5	6	1	3	2	4
				POE Score	s		20	24	4	12	8	16
				Overall PC	E Results		5	6	1	3	2	4
Airports												
Total volume [tons]	114,877	10,942	830,846	147,933	315,944	137,712	5	6	1	3	2	4
				Airport Sc	ores		5	6	1	3	2	4
				Overall Ai	rport Results	i	5	6	1	3	2	4
Maritime Ports												
Total volume [millions tons]	0.74	0.07	5.33	0.95	2.03	0.88	5	6	1	3	2	4
Total number TEUs	7,372	702	53,319	9,494	20,276	8,838	5	6	1	3	2	4
				Maritime	Port Score		10	12	2	6	4	8
				Overall Ma	aritime Resul	ts	5	6	1	3	2	4
			Corridor	Raw Data				Eval	uatio	n Re	sults	

	Α	В	С	D	E	F	Α	В	С	D	E	F
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Railroads Border Crossing at POE <sup>1</sup>												
Number rail cars												
Total volume [tons]	1,911,402		2,993,408	1,911,402	1,911,402		2	5	1	2	2	5
Total Number TEUs												
Value of goods Millions \$	11,989		14,765	11,989	11,989		2	5	1	2	2	5
				Railroad S	cores		4	10	2	4	4	10
				Overall Ra	ilroad Resul	ts	2	5	1	2	2	5
Total AADT in Six Corridors		Sha	re of AADT	Among Corr	idors							
417,710	7.4%	0.7%	53.3%	9.5%	20.3%	8.8%						

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Historical data from Texas BINS Technical Committee Representative, see Tables 6 - 9 for details.

Lower Score represents greater need.

<sup>&</sup>lt;sup>1</sup> UP rail data are divided equally among four corridors: Ports to Plains, IH-10, IH-35 & IH-69. The BNSF rail data are allocated to the IH-10 Corridor assignments for the rail data are obtained from the Part 2 POE questionnaire submitted by the Texas BINS Technical Committee representative. Since no railroads operate in the La Entrada and US-83 Corridors, there are no data for those corridors.

Table 4
Corridor Changes and Results, 2000-2020

			Corridor	Raw Data				Eval	uatio	n Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	Е	F
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Highways												
Average Annual Daily Traffic	14,161	1,217	85,178	19,526	35,178	16,440	5	6	1	3	2	4
Highway Length [in km]	0.0	0.0	0.0	0.0	0.0	0.0	1	1	1	1	1	1
LOS [A=1 to F = 9]												
Capacity at Peak Hour												
-				Highway S	Scores		6	7	2	4	3	5
				Overall Hi	ghway Resul	lts	5	6	1	3	2	4
Land Port of Entry Border Crossing												
Number trucks	143,917	12,365	865,664	198,448	357,520	445,556	5	6	1	3	2	4
Total volume [tons]	861,826	74,048	5,183,890	1,188,373	2,140,949	1,000,553	5	6	1	3	2	4
Value of goods Millions \$	\$9,842	\$846	\$59,200	\$13,571	\$24,450	\$11,426	5	6	1	3	2	4
# passenger vehicles & buses	2,446,381	210,194	14,714,998	3,373,318	6,077,302	2,840,171	5	6	1	3	2	4
				POE Score	s		20	24	4	12	8	16
				Overall PC	E Results		5	6	1	3	2	4
Airports												
Total volume [tons]	73,145	6,285	439,967	100,860	181,707	84,919	5	6	1	3	2	4
				Airport Sc	ores		5	6	1	3	2	4
				Overall Ai	rport Results	S	5	6	1	3	2	4
Maritime Ports												
Total volume [millions tons]	0.39	0.03	2.36	0.54	0.97	0.46	5	6	1	3	2	4
Total number TEUs	8,247	709	49,608	11,372	20,488	9,575	5	6	1	3	2	4
				Maritime	Port Score		10	12	2	6	4	8
				Overall Ma	aritime Resu	Its	5	6	1	3	2	4
			Corridor	Raw Data				Eval	uatio	n Re	sults	

	Α	В	С	D	E	F	Α	В	С	D	E	F
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Railroads Border Crossing at POE												
Number rail cars												
Total volume [tons]	721,979		1,130,677	721,979	721,979		2	5	1	2	2	5
Total Number TEUs												
Value of goods Millions \$	7,470		9,200	7,470	7,470		2	5	1	2	2	5
				Railroad S	Scores		4	10	2	4	4	10
				Overall Ra	ailroad Resul	ts	2	5	1	2	2	5
Total AADT in Three Corridors		Sha	re of AADT	Among Cor	ridors							
171,700	8.2%	0.7%	49.6%	11.4%	20.5%	9.6%						

POE, Airport & Maritime port data are assigned to Corridors based on AADT distribution.

Differences are estimated by subtracting the year 2000 data from the 2020 projections.

Since no railroads operate in the La Entrada and US-83 Corridors, there are no rail data for those corridors.

See Tables 6 - 9 for details.

Lower Score represents greater need.

Table 5
Corridor Percent Changes and Results, 2000-2020

			Corrido	r Raw Data				Eva	luatio	n Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	Е	F
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Highways												
Average Annual Daily Traffic	85.1%	70.9%	61.9%	97.0%	71.0%	80.3%	2	5	6	1	4	3
Highway Length [in km]	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	1	1	1	1	1	1
LOS [A=1 to F = 9]												
Capacity at Peak Hour												
				Highway	Scores		3	6	7	2	5	4
				Overall H	ighway Resu	Its	2	5	6	1	4	3
Land Port of Entry Border Crossing												
Number trucks	60.0%	60.0%	60.0%	60.0%	60.0%	60.0%	1	1	1	1	1	1
Total volume [tons]	77.1%	77.1%	77.1%	77.1%	77.1%	77.1%	1	1	1	1	1	1
Value of goods Millions \$	191.8%	191.8%	191.8%	191.8%	191.8%	191.8%	1	1	1	1	1	1
# passenger vehicles & buses	59.2%	59.2%	59.2%	59.2%	59.2%	59.2%	1	1	1	1	1	1
				POE Score	es		4	4	4	4	4	4
				Overall P	OE Results		1	1	1	1	1	1
Airports												
Total volume [tons]	132.1%	132.1%	132.1%	132.1%	132.1%	132.1%	1	1	1	1	1	1
				Airport S	cores		1	1	1	1	1	1
				Overall A	irport Result	s	1	1	1	1	1	1
Maritime Ports												
Total volume [millions tons]	90.6%	90.6%	90.6%	90.6%	90.6%	90.6%	1	1	1	1	1	1
Total number TEUs <sup>1</sup>	+%	+%	+%	+%	+%	+%	1	1	1	1	1	1
				Maritime	Port Score		2	2	2	2	2	2
				Overall N	laritime Resu	ılts	1	1	1	1	1	1

			Corrido	r Raw Data				Eva	uatio	n Re	sults	
	Α	В	С	D	E	F	Α	В	С	D	E	F
	Ports to Plains	La Entrada al Pacifico	IH-10	IH-35	IH-69	U.S. 83						
Railroads Border Crossing at POE												
Number rail cars												
Total volume [tons]	60.7%		60.7%	60.7%	60.7%		1	5	1	1	1	5
Total Number TEUs												
Value of goods Millions \$	165.3%		165.3%	165.3%	165.3%		1	5	1	1	1	5
				Railroad S	Scores		2	10	2	2	2	10
				Overall Ra	ailroad Resul	ts	1	1	1	1	1	5

Lower Score represents greater need.

<sup>&</sup>lt;sup>1</sup>. The number of TEU's increased from zero so no calculation is made for the percent increase Since no railroads operate in the La Entrada and US-83 Corridors, there are no rail data for those corridors. See Tables 6 - 9 for details.

Table 6 Highway Data

	Sı	ımmary D	ata fo	or the	Ports t	o Plains	Corrid	lor					
		Yea	2000	)				Year 2	020				
	US-57	US-83	US-	277	Total	US	5-57	US-83	US-277	Total			
AADT:	3,870	10,813	1,9	950	16,633	6,	169	21,393	3,233	30,794			
Highway Length:	77.7	58.5	58	3.2	194.3	7	7.7	58.5	58.2	194.3			
	Sumn	nary Data	for ti	he La	Entrada	al Pacif	ico Co	rridor					
		Year	2000	)				Year 2	020				
	US	-67		Tot	al		US-	67	To	tal			
AADT:	1,7	717		1,7	17		2,93	33	2,9	33			
Highway Length:	10	0.7		100	).7		100	.7	100	0.7			
	Sı	ummary D	ata fo	or the	: IH-10 C	orridor	for 20	00					
	I-10	I-110		US		US-8!		Loop 375		tal			
AADT:	47,921	39,69	90		90	22,39	0	17,852		,541			
Highway Length:	87.9	0.9		62	2.7	5.6		49.2	20	6.4			
	Sı	ummary D	ata f	or the	H-10 C	orridor	for 202	20					
	I-10	I-110	)	US	-62	US-8!	5	Loop 375	To	tal			
AADT:	76,847	56,35	57	16,	301	36,59	3	36,620	222	,719			
Highway Length:	87.9	0.9		62	2.7	5.6		49.2	20	6.4			
Summary Data for the IH-35 Corridor													
		Year	2000	)				Year 2	020				
	I-35	US-90	SS	-20	Total	I-	35	US-90	SS-20	Total			
AADT:	15,301	1,725		103	20,129		606	3,167	4,883	39,655			
Highway Length:	67.0	175.1		1.1	256.2		7.0	175.1	14.1	256.2			
	Sı	ummary D	oata fo	or the	H-69 C	orridor	for 20	00					
	US-	59	US	S-77	U	S-281		S-359	To	tal			
AADT:	4,06	52	23	,157	1	8,107		4,189	49,	514			
Highway Length:	69.	0	6	9.1		67.1		57.6	26	2.8			
	Sı	ummary D	ata fo	or the	: IH-69 C	orridor	for 202	20					
	US-	59	US	S-77	U	S-281		S-359	To	tal			
AADT:	6,53	37	38	,648	3	1,433		8,075	84,	693			
Highway Length:	69.	0	6'	9.1		67.1		57.6	26	2.8			
		Summa	ry Da	ta for	the U.S	6. 83 Cor	ridor						
		Year	2000	)				Year 2020					
	US-83	SS	-200		Total	U	JS-83	83 SS-200 Tot					
AADT:	20,063	3 4	412		20,475	3	6,297	6	519	36,916			
Highway Length:	187.0		1.1		188.1		187.0		1.1	188.1			
	1							•					

Table 7a
Land Ports of Entry [POE] Crossing Data

	Santa Fe [El Paso]	Stanton [EI Paso]	Br of America [El Paso]	Ysleta [El Paso]	Fabens [EI Paso]	Ft Hancock	Presido⁵	Amistad Dam [Del Rio]	Del Rio	Eagle Pass I	Eagle Pass II	Columbia [Laredo]	Wld Trade Br [Laredo]
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Northbound POE	Crossing Data	a for 2000 <sup>1</sup>											
Number trucks	0	0	354,914	365,492	0	0	8,734	0	60,319	0	106,892	561,035	728,756
Tons of goods	0	0	1,102,882	1,102,882	0	0	71,368	0	183,675	0	632,957	3,379,785	4,301,545
Value [Millions \$] moved by truck	\$0.0	\$0.0	\$9,581.0	\$9,581.0	\$0.0	\$0.0	\$152.0	\$0.0	\$1,232.0	\$0.0	\$2,198.7	\$12,046.3	\$15,331.7
Number of passenger vehicles	4,671,993	0	8,168,984	3,856,461	177,484	177,484	723,560	41,528	1,927,184	1,192,316	2,165,363	130,364	0
Number of buses	30	0	7,789	183	0	0	370	0	7,073	2,068	608	300	0
Number passenger vehicles & buses	4,672,023	0	8,176,773	3,856,644	177,484	177,484	723,930	41,528	1,934,257	1,194,384	2,165,971	130,664	0
Number of rail cars	0	0	N/A	N/A	N/A	N/A	0	N/A	N/A	N/A	0	N/A	N/A
Volume of tons moved by rail	673,308	0	N/A	N/A	N/A	N/A	0	N/A	N/A	N/A	832,357	N/A	N/A
Number of TEUs moved by rail	0	0	N/A	N/A	N/A	N/A	0	N/A	N/A	N/A	0	N/A	N/A
Value [Millions \$] moved by rail	\$1,046.4	\$0.0	N/A	N/A	N/A	N/A	\$0.0	N/A	N/A	N/A	\$804.0	N/A	N/A
Northbound POE	Crossing Data	for 2020	I			T	T						
Number trucks <sup>1</sup>			567,862	584,787			13,974		96,510		171,027	897,655	1,166,010
Tons of goods <sup>2</sup> Value [Millions \$] moved by truck <sup>2</sup>													
Number of passenger vehicles <sup>1</sup>	7,475,189		13,070,374	6,170,336	283,974	283,974	940,628	66,444	3,083,494	1,907,706	3,464,581		
Number of buses <sup>1</sup>	48		12,462	293			592	0	11,317	3,308	973	480	
# passenger vehicles & buses <sup>1</sup>	7,475,237		13,082,836	6,170,629	283,974	283,974	941,220	66,444	3,094,811	1,911,014	3,465,554	480	
Number of rail cars													

	Santa Fe [El Paso]	Stanton [EI Paso]	Br of America [El Paso]	Ysleta [El Paso]	Fabens [EI Paso]	Ft Hancock	Presido <sup>5</sup>	Amistad Dam [Del Rio]	Del Rio	Eagle Pass I	Eagle Pass II	Columbia [Laredo]	Wld Trade Br [Laredo]
Volume of tons					-			-			1.007.500		
moved by rail <sup>2</sup> Number of TEUs	1,082,006										1,337,598		
moved by rail													
Value [Millions \$] moved by rail <sup>2</sup>	\$2,776.1										\$2,133.0		
Percent Change in	POE Data: 2	000 to 2020	)							•			
Number trucks <sup>3</sup>													
Tons of goods <sup>4</sup>													
Value [Millions \$] moved by truck <sup>4</sup>													
Number of passenger vehicles													
Number of buses													
# passenger vehicles & buses <sup>3</sup>													
Number of rail cars													
Volume of tons moved by rail <sup>4</sup>	60.7%										60.7%		
Number of TEUs moved by rail													
Value [Millions \$] moved by rail <sup>4</sup>	165.3%										165.3%		

Number of trucks = northbound trucks that cross the US-Mexico border

Tons of goods = carried by northbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by northbound trucks that cross the US-Mexico border.

Number of passenger vehicles = northbound passenger vehicles that cross the US-Mexico border.

Number of buses = northbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of northbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = northbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by northbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are northbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by northbound rail cars that cross the US-Mexico border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee

This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- <sup>1</sup> From the Texas BINS Technical Committee representative.
- <sup>2</sup> Derived by multiplying the 2000 data by the appropriate growth rate.
- 3 Calculated by subtracting the 2000 data from the 2020 projections, and dividing the result by the 2000 data.
- The growth rates for tons and dollars are derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, "Freight Transportation Profile Texas". There are absolute values forecast for the year 2020 for tons and dollars with 1998 data as the base year. Growth rates are calculated for the 22 year period, and 20 year growth rates are estimated. These 20-year growth rates are the ones used in this table. For trucks, the compound annual growth rate for tonnage is 2.9% and for value is 5.5%. For rail, the compound annual growth rate for tonnage is 2.4% and for value is 5.0%.
- The rail border crossing at Presidio has been inactive since 1998. In that year, the South Orient Railroad Company filed an abandonment application with the Surface Transportation Board for the rail line. The abandonment was denied, but SORC was granted permission to discontinue service to the border. According to SORC's abandonment application, 1,910 rail cars were interchanged at Presidio in 1996 (valued at \$35.6 million), dropping to 857 in 1997 (valued at \$22.7 million). The state of Texas purchased the South Orient line from San Angelo Junction (near Coleman) to Presidio early in 2001, and leased operations to Texas Pacifico Transportation (TXPF). TXPF is in the process of rehabilitating the infrastructure and has committed to resuming service to the border at Presidio by January 2004. TXPF has not developed traffic projections at this time for rail cars crossing the border, but are in negotiations with shippers and interchanging railroads (Ferromex at Presidio; BNSF, & Fort Worth and Western at San Angelo Junction) to develop traffic along the route. Local groups and agencies such as La Entrada al Pacifico Rural Rail District, Pecos County Rural Rail District, and Presidio County Rural Rail District are also promoting rail service along the line.

Table 7b
Land Ports of Entry [POE] Crossing Data

	Laredo I	Laredo II	Falcon Dam	Roma	Rio Grande	Los Ebanos	Hidalgo	Pharr	Progreso	Los Indios [Browns- ville]	B&M [Browns- ville]	Gateway [Browns- ville]	Veterans [Browns- ville]
Federal inspection facilities at POE?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Northbound POE C	ossing Data	a for 2000 <sup>1</sup>											
Number trucks	0	0	452	12,824	24,065	0	0	374,150	11,461	84,422	0	0	214,816
Tons of goods Value [Millions \$1	0	0	Data Not Available Data Not	14,880	121,416	0	0	1,639,561	8,561	278,277	0	0	715,570
moved by truck	\$0.0	\$0.0	Available	\$16.0	\$116.0	\$0.0	\$0.0	\$6,374.0	\$13.0	\$1,561.6	\$0.0	\$0.0	\$4,015.4
Number of passenger vehicles	1,858,418	5,162,345	164,180	1,171,406	654,364	33,186	6,616,232	2,163,459	1,086,496	599,465	2,891,256	2,519,878	1,866,656
Number of buses	0	34,229	31	4,031	0	0	52,809	528	516	49	5	210	15,819
Number passenger vehicles & buses	1,858,418	5,196,574	164,211	1,175,437	654,364	33,186	6,669,041	2,163,987	1,087,012	599,514	2,891,261	2,520,088	1,882,475
Number of rail cars	N/A	0	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A		N/A	N/A
Volume of tons moved by rail	N/A	3,606,328	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	319,005	N/A	N/A
Number of TEUs moved by rail	N/A	0	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A		N/A	N/A
Value [Millions \$] moved by rail	N/A	\$17,004.6	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	\$267.5	N/A	N/A
Northbound POE Co	ossing Data	a for 2020											
Number trucks <sup>1</sup>			723	20,518	38,504			598,640	18,338	135,075			343,706
Tons of goods <sup>2</sup>													
Value [Millions \$] moved by truck <sup>2</sup>													
Number of passenger vehicles <sup>1</sup>	2,973,469	8,259,752	262,688	1,874,250	1,046,982	53,098	10,585,971	3,461,534	1,738,394	959,144	4,626,010	4,031,805	2,986,650
Number of buses <sup>1</sup>		54,766	50	6,450	0		84,494	845	825	78	0	336	25,310
# passenger vehicles & buses <sup>1</sup>	2,973,469	8,314,518	262,738	1,880,700	1,046,982	53,098	10,670,465	3,462,379	1,739,219	959,222	4,626,010	4,032,141	3,011,960

	Laredo I	Laredo II	Falcon Dam	Roma	Rio Grande	Los Ebanos	Hidalgo	Pharr	Progreso	Los Indios [Browns- ville]	B&M [Browns- ville]	Gateway [Browns- ville]	Veterans [Browns- ville]
Number of rail cars													
Volume of tons moved by rail <sup>2</sup>		5,795,369									512,641		
Number of TEUs moved by rail													
Value [Millions \$] moved by rail <sup>2</sup>		\$45,113.2									\$709.7		
Percent Change in I	POE Data: 2	000 to 2020											
Number trucks <sup>3</sup>													
Tons of goods <sup>4</sup>													
Value [Millions \$] moved by truck <sup>4</sup>													
Number of passenger vehicles													
Number of buses													
# passenger vehicles & buses <sup>3</sup>													
Number of rail cars													
Volume of tons moved by rail <sup>4</sup>		60.7%									60.7%		
Number of TEUs moved by rail													
Value [Millions \$] moved by rail <sup>4</sup>		165.3%									165.3%		

Number of trucks = northbound trucks that cross the US-Mexico border

Tons of goods = carried by northbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by northbound trucks that cross the US-Mexico border.

Number of passenger vehicles = northbound passenger vehicles that cross the US-Mexico border.

Number of buses = northbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of northbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = northbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by northbound rail cars that cross the US-Mexico border.

Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are northbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by northbound rail cars that cross the US-Mexico border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee

This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- <sup>1</sup> From the Texas BINS Technical Committee representative.
- <sup>2</sup> Derived by multiplying the 2000 data by the appropriate growth rate.
- <sup>3</sup> Calculated by subtracting the 2000 data from the 2020 projections, and dividing the result by the 2000 data.
- The growth rates for tons and dollars are derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, "Freight Transportation Profile Texas". There are absolute values forecast for the year 2020 for tons and dollars with 1998 data as the base year. Growth rates are calculated for the 22 year period, and 20 year growth rates are estimated. These 20-year growth rates are the ones used in this table. For trucks, the compound annual growth rate for tonnage is 2.9% and for value is 5.5%. For rail, the compound annual growth rate for tonnage is 2.4% and for value is 5.0%.
- The rail border crossing at Presidio has been inactive since 1998. In that year, the South Orient Railroad Company filed an abandonment application with the Surface Transportation Board for the rail line. The abandonment was denied, but SORC was granted permission to discontinue service to the border. According to SORC's abandonment application, 1,910 rail cars were interchanged at Presidio in 1996 (valued at \$35.6 million), dropping to 857 in 1997 (valued at \$22.7 million). The state of Texas purchased the South Orient line from San Angelo Junction (near Coleman) to Presidio early in 2001, and leased operations to Texas Pacifico Transportation (TXPF). TXPF is in the process of rehabilitating the infrastructure and has committed to resuming service to the border at Presidio by January 2004. TXPF has not developed traffic projections at this time for rail cars crossing the border, but are in negotiations with shippers and interchanging railroads (Ferromex at Presidio; BNSF, & Fort Worth and Western at San Angelo Junction) to develop traffic along the route. Local groups and agencies such as La Entrada al Pacifico Rural Rail District, Pecos County Rural Rail District, and Presidio County Rural Rail District are also promoting rail service along the line.

Table 7c Land Ports of Entry [POE] Crossing Data

Land Ports Of Entry [POE] Crossing Data	Total
Federal inspection facilities at POE?	
Northbound POE Crossing Data for 2000 <sup>1</sup>	
Number trucks	2,908,332
Tons of goods	13,553,359
Value [Millions \$] moved by truck	\$62,218.7
Number of passenger vehicles	50,020,062
Number of buses	126,648
Number passenger vehicles & buses	50,146,710
Number of rail cars	X
Volume of tons moved by rail	X
Number of TEUs moved by rail	X
Value [Millions \$] moved by rail	X
Northbound POE Crossing Data for 2020	
Number trucks <sup>1</sup>	4,653,329
Tons of goods <sup>2</sup>	24,002,999
Value [Millions \$] moved by truck <sup>2</sup>	\$181,554.2
Number of passenger vehicles <sup>1</sup>	79,606,447
Number of buses <sup>1</sup>	202,627
# passenger vehicles & buses <sup>1</sup>	79,809,074
Number of rail cars	X
Volume of tons moved by rail <sup>2</sup>	X
Number of TEUs moved by rail	X
Value [Millions \$] moved by rail <sup>2</sup>	X
Percent Change in POE Data: 2000 to 2020	
Number trucks <sup>3</sup>	60.0%
Tons of goods <sup>4</sup>	77.1%
Value [Millions \$] moved by truck <sup>4</sup>	191.8%
Number of passenger vehicles	X
Number of buses	X
# passenger vehicles & buses <sup>3</sup>	59.2%
Number of rail cars	X
Volume of tons moved by rail <sup>4</sup>	Х
Number of TEUs moved by rail	Х
Value [Millions \$] moved by rail <sup>4</sup>	X

Number of trucks = northbound trucks that cross the US-Mexico border

Tons of goods = carried by northbound trucks that cross the US-Mexico border.

Value [Millions \$] moved by truck = value of goods moved by northbound trucks that cross the US-Mexico border.

Number of passenger vehicles = northbound passenger vehicles that cross the US-Mexico border.

Number of buses = northbound buses that cross the US-Mexico border.

Number passenger vehicles & buses = sum of northbound passenger vehicles and buses that cross the US-Mexico border.

Number of rail cars = northbound rail cars that cross the US-Mexico border.

Volume of tons moved by rail = transported by northbound rail cars that cross the US-Mexico border. Number of TEUs moved by rail = Twenty foot Equivalent containers [TEUs] moved by rail that are northbound and cross the US-Mexico border.

Value [Millions \$] moved by rail = value of goods transported by northbound rail cars that cross the US-Mexico border.

Cells are X out when no totals are intended. Rail data, for example, are assigned to corridors by the BINS State Technical Committee

This makes railroads different from airports, maritime ports, passenger vehicles & buses, and trucks that are summed and distributed to the corridors using the distribution of AADT.

#### Sources:

- <sup>1</sup> From the Texas BINS Technical Committee representative.
- <sup>2</sup> Derived by multiplying the 2000 data by the appropriate growth rate.
- Calculated by subtracting the 2000 data from the 2020 projections, and dividing the result by the 2000 data.
- <sup>4</sup> The growth rates for tons and dollars are derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, "Freight Transportation Profile Texas". There are absolute values forecast for the year 2020 for tons and dollars with 1998 data as the base year. Growth rates are calculated for the 22 year period, and 20 year growth rates are estimated. These 20-year growth rates are the ones used in this table. For trucks, the compound annual growth rate for tonnage is 2.9% and for value is 5.5%. For rail, the compound annual growth rate for tonnage is 2.4% and for value is 5.0%.
- The rail border crossing at Presidio has been inactive since 1998. In that year, the South Orient Railroad Company filed an abandonment application with the Surface Transportation Board for the rail line. The abandonment was denied, but SORC was granted permission to discontinue service to the border. According to SORC's abandonment application, 1,910 rail cars were interchanged at Presidio in 1996 (valued at \$35.6 million), dropping to 857 in 1997 (valued at \$22.7 million). The state of Texas purchased the South Orient line from San Angelo Junction (near Coleman) to Presidio early in 2001, and leased operations to Texas Pacifico Transportation (TXPF). TXPF is in the process of rehabilitating the infrastructure and has committed to resuming service to the border at Presidio by January 2004. TXPF has not developed traffic projections at this time for rail cars crossing the border, but are in negotiations with shippers and interchanging railroads (Ferromex at Presidio; BNSF, & Fort Worth and Western at San Angelo Junction) to develop traffic along the route. Local groups and agencies such as La Entrada al Pacifico Rural Rail District, Pecos County Rural Rail District, and Presidio County Rural Rail District are also promoting rail service along the line.

Table 8
Airport Data

	Browns- ville	Del Rio	El Paso	Laredo	Maverick	McAllen- Miller	Presidio Lely	Rio Grande	Total
Within 100 km of the US-Mexico Border?	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	
Designated as an International POE?	Υ	Υ	Υ	Υ	Υ	Υ	Υ	Υ	
Historical Data for 2000									
Longest runway length, in feet	7,400	5,000	11,010	8,236	5,500	7,120	5,200	8,299	11,010
Tons of goods exported & imported	65,408	NA	318,645	218,155	NA	NA	NA	69,164	671,372
Airport served by railroad facility?	N	N	N	N	N	N	N	N	
If yes, name of railroad									
On-land movement of air freight									
Share of goods moved by truck									
Share of goods moved by railroad									
Projections for 2020									
Longest runway length	7,400	6,300	11,010	8,236	5,500	7,120	5,200	8,299	11,010
Date becomes operational		2004							
Tons of goods exported & imported									1,558,254
Airport served by railroad facility?									
If yes, name of railroad									
On-land movement of air freight									
Share of goods moved by truck									
Share of goods moved by railroad	_	_				_			
Percent Change: 2000 to 2020									
Longest runway length									
Tons of goods exported & imported									132.1%

#### **Airports Not Meeting Minimum Criteria:**

Cameron County Airport, Corpus Christi International Airport, Crystal City Municipal Airport, Dimmit County Airport, Edinburg Airport, Mid Valley Airport, Starr County Airport, Terrell County Airport and Zapata County Airport - none of these are included in the analysis.

#### Source:

Runway Dimensions & 2000 Tonnage: Texas BINS Technical Committee representative.

Percent Change: 2000 to 2020 The growth rate for air tonnage is derived from data published by the Office of Freight Management and Operations, FHWA, US Department of Transportation, "Freight Transportation Profile - Texas". There are absolute values forecast for the year 2020 tons with 1998 data as the base year. The Growth rate is calculated for the 22 year period, and a 20 year growth rates is estimated. This 20-year growth rates is the one used in this table. For air tonnage, the compound annual growth rate is 4.3%.

2020 Tonnage Obtained by multiplying the growth rate by the 2000 tonnage.

# Table 9 **Maritime Port Data**

		Port of	Brownsville	
Within 100 km of the US-Mexico Border?	Yes			
Designated as an International POE?	Yes			
			Changes 20	00 to 2020
	2000	2020	Absolute	Percent
Main Channel Depth, in feet	42	55	13	31.0%
Total tons of goods exported & imported <sup>1</sup>	5.25	10.00	4.75	90.6%
Total number TEUs exported & imported	0	100,000	100,000	+%
Maritime ports served by railroad facility?	Yes			
If yes, name of railroad	Brownsville	Rio Grande Int	ternational	
On-land movement of air freight	Х	Х	Х	Х
Share of goods moved by truck	65.0%	50.0%		
Share of goods moved by railroad	35.0%	50.0%		

## Notes:

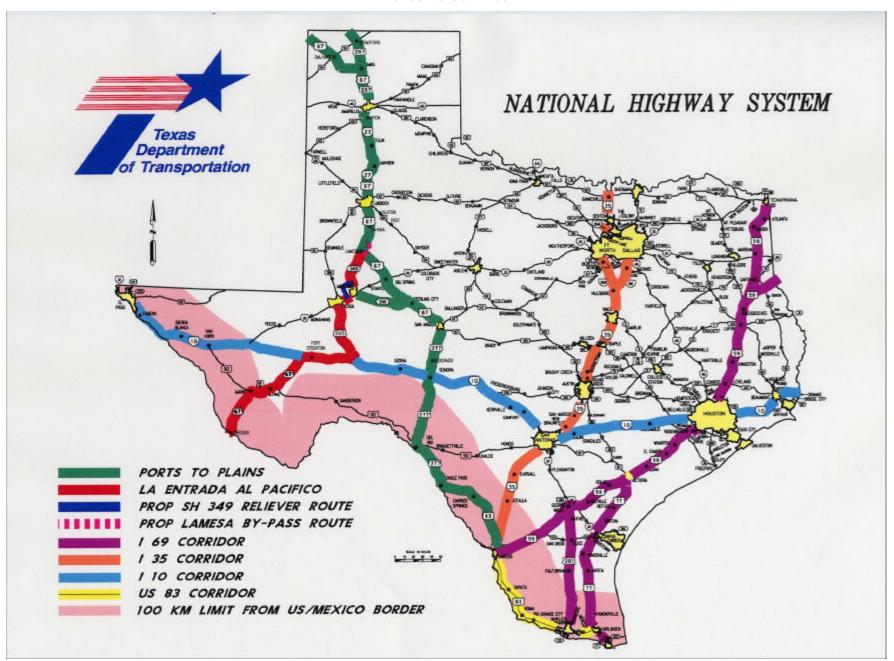
The number of TEU's increased from zero so no calculation is made for the percent increase.

Maritime Ports Not Meeting Minimum Criteria: The Ports of Houston, Texas City, Freeport, Galveston, Corpus Christi, Port Arthur and Beaumont are not included in the analysis because they are not within 100 km of the US-Mexico border

Sources: Texas BINS Technical Committee representative.

<sup>&</sup>lt;sup>1</sup> millions of metric tons

Map 1 Texas Border Area



## **TEXAS HIGHWAY DATA**

# Methodology For Calculating Corridor Averages for Average Annual Daily Traffic [AADT], Level of Service [LOS], and Peak Hour Traffic Carrying Capacity

Corridor totals for highways are obtained for highway length, AADT, LOS and Peak Hour Traffic Carrying Capacity. The corridor total for each of these indicators is obtained by adding the data for each of the highways assigned to the corridor. The State BINS Technical Committee representative assigned the highways to the corridors. Each of the compilations for each of the indicators is now reviewed.

**HIGHWAY LENGTH**—the length of each highway within the 100 km limit. The length is obtained for each highway by subtracting the beginning mile marker, from the last mile marker. If segments are omitted, those segments and their data are omitted from the highway total. The highway length for the entire corridor is obtained by summing the highway length for each highway in the corridor.

**WEIGHTED AVERAGE**—an average in which each of the observations is multiplied [or "weighted"] by a factor before calculations. In addition, these weights sum to unity or one [1]. Weighted averages are used so that short and long segments of roadway are counted proportionately in calculating the average for the entire highway.

**AVERAGE ANNUAL DAILY TRAFFIC**—the weighted average AADT for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the AADT for that segment to obtain the weighted AADT for the segment. Step 3: The weighted AADT for all the segments are summed to obtain the weighted average AADT for the highway. The weighted average AADT for all the highways in the corridor are then summed to obtain the Corridor Total AADT.

**LEVEL OF SERVICE**—the weighted average LOS for each highway is calculated in the same manner as that used for AADT. A major difference is that LOS is provided in the letters A, B, C, D, E, F0, F1, F2 and F3. These letters are converted to numbers using the following system, A=1, B=2, C=3, D=4, E=5, F0=6, F1=7, F2=8, and F3=9. After the conversions the following steps are used to calculate LOS for each highway. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the LOS number for that segment to obtain the weighted LOS number for all the segments are summed to obtain the weighted average LOS for the highway. The weighted average LOS number for all the highways in the corridor are then summed to obtain the Corridor Total LOS.

**PEAK HOUR TRAFFIC CARRYING CAPACITY [PCAP]**—the weighted average PCAP for each highway is obtained in several steps. Step 1: obtain the segment weights by dividing each segment length by the total highway length. The percent of the highway contained in the segment under investigation is the highway weight. Step 2: This highway weight is then multiplied by the PCAP for that segment to obtain the weighted PCAP for the segment. Step 3: The weighted PCAP for all the segments are summed to obtain the weighted average PCAP for the highway. The weighted average PCAP for all the highways in the corridor are then summed to obtain the Corridor Total PCAP.

# HIGHWAY DATA COMPILED INTO CORRIDOR FORM USED IN TABLE 5 OF CORRIDOR EVALUATION FOR TEXAS

Segment Length Is the Basis for Estimating The Weighted Average for AADT, Los And Capacity.

Table 1
Summary Corridor Results

		,	Summa	ry Dat	a for	the	IH-10 Cori	ridor for	2000					
	I-10		I-1	10		ι	JS-62	US	-85	Le	oop 37	<b>7</b> 5	7	otal
AADT:	47,921		39,	690		9	,690	22,	390		17,852	2	13	7,541
Highway Length:	87.9		0	.9			62.7	5	5.6 49.2		49.2	9.2 <b>206.4</b>		
	Summary Data for the IH-10 Corridor for 2020													
	I-10		I-11	0	US-6	2	US-85	Loc	op 37!	5	Tota	I		
AADT:	76,847		56,35	57	16,30	)1	36,593	30	6,620				222,71	9
Highway Length:	87.9		0.9		62.7	7	5.6	,	49.2				206.4	
			Su	mmary	/ Dat	a for	the IH-35	Corrido	r					
		C	Calenda	ar Year	<b>200</b>	0				Cale	ndar `	Year	2020	
	I-35		US-9	0	SS-2	20	Total	1-35	5	ι	JS-90		SS-20	Total
AADT:	15,301		1,72	5	3,10	3	20,129	31,60	06		3,167		4,883	39,655
Highway Length:	67.0		175.	1	14.	1	256.2	67.0	)	•	175.1		14.1	256.2
			Summa	ry Dat	a for	the	IH-69 Cori	ridor for	2000	)				
	US	-59		U	IS-77		US	-281		S.	-359		1	otal
AADT:	4,0	062		23	3,157		18	,107		4	,189		4	9,514
Highway Length:	69	9.0		(	69.1		6	7.1		5	7.6		2	262.8
			Summa	ry Dat	a for	the	IH-69 Cori	ridor for	2020	)				
	US	-59		U	<b>IS-77</b>		US	-281		S.	-359		1	otal
AADT:	6,!	537		38	8,648		31	,433		8	,075		84,693	
Highway Length:	69	9.0		(	69.1		6	7.1		5	7.6		2	262.8
			Sur	nmary	Data	for	the U.S. 8	3 Corrid	or					
	Calendar	Yea	ar 2000							Cale	ndar `	Year	2020	
	US-83		SS-2	200	Tota	al		US-	83	SS	-200		To	tal
AADT:	20,063		41		20,4			36,2	97		19		36,	
Highway Length:	187.0		1.	1	188	.1		187	.0	,	1.1		18	3.1
		(	Summa	ry Dat	a for	the	Ports to P	lains Co	rrido	r				
		(	Calenda	ar Year	200	0				Cale	ndar `	Year	2020	•
	US-57	U	S-83	US-2	77		Total	US-5	7	US-8	33	ι	JS-277	Total
AADT:	3,870		),813	1,95			6,633	6,169	)	21,3			3,233	30,794
Highway Length:	77.7	5	58.5	58.2	2		194.3	77.7		58.	5		58.2	194.3
	Su	mma	ary Dat	a for L	_a En	trada	a al Pacifio	o Corri	dor fo	r 200	0			
	Calendar	Yea	ar 2000	1						Cale	ndar `	Year	2020	
	U:	S-67		Tota	I				US-6	67			To	tal
AADT:		717		1,71					2,93				2,9	
Highway Length:	10	00.7		100.	7				100	.7			10	0.7
Source: Texas BINS Tech	nnical Comm	ittee	Represe	ntative										

# THE IH-10 CORRIDOR: CALENDAR YEAR 2000 DATA

Table 2a Interstate 10, Calendar Year 2000 Data

Within 100 km	n of the US-Mexico I	Interstate 10		Υ
	rnational POE?	border:		Y
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	0.000	0.218	0.218	31,120
2	0.218	2.964	2.746	35,150
3	2.964	6.364	3.400	40,740
4	6.364	9.200	2.836	48,020
5	9.200	11.174	1.974	63,280
6	11.174	13.289	2.115	79,730
7	13.289	13.488	0.199	93,660
8	13.488	16.050	2.562	109,940
9	16.050	18.092	2.042	118,690
10	18.092	19.419	1.327	121,290
11	19.419	21.462	2.043	155,410
12	21.462	21.641	0.179	163,160
13	22.387	22.479	0.092	163,160
14	22.479	22.829	0.350	163,930
15	22.829	23.335	0.506	163,930
16	23.335	24.562	1.227	200,180
17	24.562	25.499	0.937	188,390
18	25.499	26.411	0.912	192,310
19	26.411	27.437	1.026	181,440
20	27.437	28.977	1.540	136,280
21	28.977	29.726	0.749	136,280
22	29.726	30.701	0.975	140,540
23	30.701	33.016	2.315	56,630
24	33.013	34.751	1.738	55,570
25	34.751	38.689	3.938	32,000
26	38.689	43.602	4.913	19,190
27	43.602	50.276	6.674	17,550
28	50.276	50.470	0.194	15,760
29	50.470	56.322	5.852	15,760
30	56.322	62.524	6.202	13,930
31	0.000	10.752	10.752	13,900
32	10.752	16.915	6.163	13,300
33	16.915	26.069	9.154	13,300
		Sum	87.850	2,993,520

Interstate 10				
Segment	Weight	AADT		
1	0.2%	77		
2	3.1%	1,099		
3	3.9%	1,577		
4	3.2%	1,550		
5	2.2%	1,422		
6	2.4%	1,920		
7	0.2%	212		
8	2.9%	3,206		
9	2.3%	2,759		
10	1.5%	1,832		
11	2.3%	3,614		
12	0.2%	332		
13	0.1%	171		
14	0.4%	653		
15	0.6%	944		
16	1.4%	2,796		
17	1.1%	2,009		
18	1.0%	1,996		
19	1.2%	2,119		
20	1.8%	2,389		
21	0.9%	1,162		
22	1.1%	1,560		
23	2.6%	1,492		
24	2.0%	1,099		
25	4.5%	1,434		
26	5.6%	1,073		
27	7.6%	1,333		
28	0.2%	35		
29	6.7%	1,050		
30	7.1%	983		
31	12.2%	1,701		
32	7.0%	933		
33	10.4%	1,386		
Sum	100.0%	47,921		

Table 2b United States 62, Calendar Year 2000 Data

		United States 62	2	
Within 100	km of the US-Mex	ico Border?		Υ
Serves an I	nternational POE?			Υ
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	5.719	6.221	0.502	21,000
2	6.221	8.202	1.981	23,000
3	8.202	9.606	1.404	22,000
4	9.606	10.333	0.727	19,500
5	10.333	10.792	0.459	13,000
6	10.792	10.900	0.108	37,000
7	0.821	1.248	0.427	14,100
8	12.640	13.160	0.520	37,000
9	13.160	15.386	2.226	34,000
10	15.385	16.296	0.911	45,000
11	16.296	16.772	0.476	42,000
12	16.772	18.315	1.543	38,000
13	18.315	21.602	3.287	20,000
14	21.602	24.843	3.241	10,700
15	24.843	31.176	6.333	16,000
16	31.176	32.273	1.097	3,000
17	32.273	33.672	1.399	3,000
18	33.672	37.919	4.247	1,900
19	0.000	13.974	13.974	1,850
20	13.974	28.763	14.789	1,850
21	30.000	33.089	3.089	1,850
		Sum	62.740	405,750

Es	timating the Weighted Aver	ages				
	United States 62					
Segment	Weight	AADT				
1	0.8%	168				
2	3.2%	726				
3	2.2%	492				
4	1.2%	226				
5	0.7%	95				
6	0.2%	64				
7	0.7%	96				
8	0.8%	307				
9	3.5%	1,206				
10	1.5%	653				
11	0.8%	319				
12	2.5%	935				
13	5.2%	1,048				
14	5.2%	553				
15	10.1%	1,615				
Segment	Weight	AADT				
16	1.7%	52				
17	2.2%	67				
18	6.8%	129				
19	22.3%	412				
20	23.6%	436				
21	4.9%	91				
Sum	100.0%	9,690				
Source: Texas BINS Techni	Source: Texas BINS Technical Committee representative					

Table 2c Interstate 110, Calendar Year 2000 Data

	Interstate 110						
Within 100	Within 100 km of the US-Mexico Border?						
Serves an Ir	nternational PO	<b>E</b> ?		Υ			
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic			
1	5.019	5.505	0.486	31,430			
2	5.505	5.938 0.433		48,960			
		Sum	0.919	80,390			
	Estim	ating the Weigh	nted Averages				
		Interstate	110				
Segn	nent	Weight		AADT			
1		52.9%		16,621			
2 47.1%				23,068			
Sui	Sum 100.0% 39,690						
Source: Texa	Source: Texas BINS Technical Committee representative						

Table 2d United States 85, Calendar Year 2000 Data

	United States 85						
Within 100	Within 100 km of the US-Mexico Border?						
Serves an I	Serves an International POE?						
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic			
1	1.105	2.512	1.407	27,000			
2	2.512	4.132	1.620	23,000			
3	4.132	5.719	1.587	21,000			
4	0.089	0.633	0.544	15,000			
5	0.633	1.105	0.472	19,740			
		Sum	5.630	105,740			
	Estimat	ing the Weighte	d Averages				
		<b>United States</b>	85				
Segn	nent	Weight		AADT			
1		25.0%		6,748			
2	2	28.8%		6,618			
3	3 28.2%						
4		9.7%		1,449			
5		8.4%		1,655			
Su	m	100.0%		22,390			
Source: Tex	Source: Texas BINS Technical Committee representative						

Table 2e Loop 375, Calendar Year 2000 Data

	Loop 375						
Within 100	km of the US-Mexico	Border?		Υ			
Serves an II	Υ						
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic			
1	0.000	1.000	1.000	9,300			
2	1.000	7.200	6.200	8,300			
3	7.200	11.699	4.499	8,400			
4	11.699	13.579	1.880	15,300			
5	13.579	13.700	0.121	8,900			
6	13.700	14.670	0.970	4,170			
7	14.670	14.816	0.146	6,780			
8	14.816	20.132	5.316	6,780			
9	20.132	25.430	5.298	10,800			
10	5.000	7.590	2.590	12,100			
11	7.590	8.104	0.514	18,000			
12	8.104	12.598	4.494	42,000			
13	12.598	13.915	1.317	36,980			
14	13.915	14.865	0.950	22,680			
15	14.865	15.123	0.258	23,000			
16	15.123	16.346	1.223	13,970			
17	0.509	3.793	3.284	28,000			
18	3.793	8.147	4.354	30,000			
19	8.147	10.065	1.918	33,000			
20	10.065	12.119	2.054	16,400			
21	12.119	12.684	0.565	13,000			
22	12.684	12.947	0.263	9,000			
		Sum	49.214	376,860			

Estimating the Weighted Averages					
Loop 375					
Segment	Weight	AADT			
1	2.0%	189			
2	12.6%	1,046			
3	9.1%	768			
4	3.8%	584			
5	0.2%	22			
6	2.0%	82			
7	0.3%	20			
8	10.8%	732			
9	10.8%	1,163			
10	5.3%	637			
11	1.0%	188			
12	9.1%	3,835			
13	2.7%	990			
14	1.9%	438			
Segment	Weight	AADT			
15	0.5%	121			
16	2.5%	347			
17	6.7%	1,868			
18	8.8%	2,654			
19	3.9%	1,286			
20	4.2%	684			
21	1.1%	149			
22	0.5%	48			
Sum	100.0%	17,852			
Source: Texas BINS Technical Committee representative					

# THE IH-10 CORRIDOR: CALENDAR YEAR 2020 DATA

Table 3a Interstate 10, Calendar Year 2020 Data

		Interstate 10		
Within 100 km	Υ			
Serves an Inte	Υ			
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	0.000	0.218	0.218	60,650
2	0.218	2.964	2.746	64,130
3	2.964	6.364	3.400	70,260
4	6.364	9.200	2.836	82,340
5	9.200	11.174	1.974	121,590
6	11.174	13.289	2.115	144,370
7	13.289	13.488	0.199	139,750
8	13.488	16.050	2.562	166,020
9	16.050	18.092	2.042	179,210
10	18.092	19.419	1.327	175,880
11	19.419	21.462	2.043	218,710
12	21.462	21.641	0.179	228,670
13	22.387	22.479	0.092	228,670
14	22.479	22.829	0.350	229,500
15	22.829	23.335	0.506	248,160
16	23.335	24.562	1.227	283,480
17	24.562	25.499	0.937	269,510
18	25.499	26.411	0.912	274,700
19	26.411	27.437	1.026	254,020
20	27.437	28.977	1.540	213,140
21	28.977	29.726	0.749	213,050
22	29.726	30.701	0.975	231,160
23	30.701	33.016	2.315	80,410
24	33.013	34.751	1.738	78,910
25	34.751	38.689	3.938	45,440
26	38.689	43.602	4.913	27,250
27	43.602	50.276	6.674	36,410
28	50.276	50.470	0.194	31,180
29	50.470	56.322	5.852	31,180
30	56.322	62.524	6.202	28,960
31	0.000	10.752	10.752	28,940
32	10.752	16.915	6.163	25,700
33	16.915	26.069	9.154	25,700
	1	Sum	87.850	4,537,050

	Interstate 10	
Segment	Weight	AADT
1	0.2%	151
2	3.1%	2,005
3	3.9%	2,719
4	3.2%	2,658
5	2.2%	2,732
6	2.4%	3,476
7	0.2%	317
8	2.9%	4,842
9	2.3%	4,166
10	1.5%	2,657
11	2.3%	5,086
12	0.2%	466
13	0.1%	239
14	0.4%	914
15	0.6%	1,429
16	1.4%	3,959
17	1.1%	2,875
18	1.0%	2,852
19	1.2%	2,967
20	1.8%	3,736
21	0.9%	1,816
22	1.1%	2,566
23	2.6%	2,119
24	2.0%	1,561
25	4.5%	2,037
26	5.6%	1,524
27	7.6%	2,766
28	0.2%	69
29	6.7%	2,077
30	7.1%	2,045
31	12.2%	3,542
32	7.0%	1,803
33	10.4%	2,678
Sum	100.0%	76,847

Table 3b United States 62, Calendar Year 2020 Data

United States 62				
Within 100 km of the US-Mexico Border?				Υ
Serves an I	Υ			
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	5.719	6.221	0.502	29,400
2	6.221	8.202	1.981	32,200
3	8.202	9.606	1.404	30,800
4	9.606	10.333	0.727	27,300
5	10.333	10.792	0.459	18,200
6	10.792	10.900	0.108	51,800
7	0.821	1.248	0.427	19,740
8	12.640	13.160	0.520	51,800
9	13.160	15.386	2.226	47,600
10	15.385	16.296	0.911	63,000
11	16.296	16.772	0.476	58,800
12	16.772	18.315	1.543	53,200
13	18.315	21.602	3.287	47,460
14	21.602	24.843	3.241	21,930
15	24.843	31.176	6.333	35,790
16	31.176	32.273	1.097	4,340
17	32.273	33.672	1.399	4,340
18	33.672	37.919	4.247	2,660
19	0.000	13.974	13.974	2,590
20	13.974	28.763	14.789	2,590
21	30.000	33.089	3.089	2,590
		Sum	62.740	608,130

Estimating the Weighted Averages					
United States 62					
Segment	Weight	AADT			
1	0.8%	235			
2	3.2%	1,017			
3	2.2%	689			
4	1.2%	316			
5	0.7%	133			
6	0.2%	89			
7	0.7%	134			
8	0.8%	429			
9	3.5%	1,689			
10	1.5%	915			
11	0.8%	446			
12	2.5%	1,308			
13	5.2%	2,486			
14	5.2%	1,133			
15	10.1%	3,613			
Segment	Weight	AADT			
16	1.7%	76			
17	2.2%	97			
18	6.8%	180			
19	22.3%	577			
20	23.6%	611			
21	4.9%	128			
Sum	100.0%	16,301			
Source: Texas BINS Technical Committee representative					

# Table 3c Interstate 110, Calendar Year 2020 Data

Interstate 110						
Within 100 km of the US-Mexico Border?			Υ			
Serves an II	nternational PO	E?		Υ		
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic		
1	5.019	5.505	0.486	44,630		
2	5.505	5.938	0.433	69,520		
		Sum	0.919	114,150		
	Estimating the Weighted Averages					
	Interstate 110					
Segn	nent	Weight		AADT		
1		52.9%		23,602		
2		47.1%		32,755		
Sui	m	100.0%		56,357		
Source: Texas BINS Technical Committee representative						

Table 3d United States 85, Calendar Year 2020 Data

United States 85						
Within 100	Within 100 km of the US-Mexico Border?					
Serves an I	nternational POE?				Υ	
Segment #	Begin Post Mile	End Post Mile		igth Ies	Avg Ann Daily Traffic	
1	1.105	2.512	1.4	107	43,150	
2	2.512	4.132	1.6	520	34,670	
3	4.132	5.719	1.5	587	39,340	
4	0.089	0.633	0.5	544	25,120	
5	0.633	1.105	0.4	172	27,640	
	Sum 5.630			169,920		
	Estimat	ing the Weighte	d Aver	ages		
		<b>United States</b>	85			
Segn	nent	Weight			AADT	
1		25.0%			10,784	
2	2	28.8%			9,976	
3	3	28.2% 11,089		11,089		
4	4 9.7% 2,427		2,427			
5	5	8.4% 2,317			2,317	
Su	m	100.0% 36,593				
Source: Texa	as BINS Technical Comr	nittee representativ	re			

Table 3e Loop 375, Calendar Year 2020 Data

	Loop 375					
Within 100	km of the US-Mexico	Border?		Υ		
Serves an li	Serves an International POE?					
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic		
1	0.000	1.000	1.000	16,090		
2	1.000	7.200	6.200	17,530		
3	7.200	11.699	4.499	16,000		
4	11.699	13.579	1.880	24,530		
5	13.579	13.700	0.121	12,460		
6	13.700	14.670	0.970	5,840		
7	14.670	14.816	0.146	9,490		
8	14.816	20.132	5.316	9,490		
9	20.132	25.430	5.298	28,880		
10	5.000	7.590	2.590	36,300		
11	7.590	8.104	0.514	54,000		
12	8.104	12.598	4.494	110,580		
13	12.598	13.915	1.317	85,280		
14	13.915	14.865	0.950	43,330		
15	14.865	15.123	0.258	52,070		
16	15.123	16.346	1.223	19,560		
17	0.509	3.793	3.284	57,220		
18	3.793	8.147	4.354	45,560		
19	8.147	10.065	1.918	46,650		
20	10.065	12.119	2.054	22,960		
21	12.119	12.684	0.565	20,410		
22	12.684	12.947	0.263	12,600		
		Sum	49.214	746,830		

	Loop 375	
Segment	Weight	AADT
1	2.0%	327
2	12.6%	2,208
3	9.1%	1,463
4	3.8%	937
5	0.2%	31
6	2.0%	115
7	0.3%	28
8	10.8%	1,025
9	10.8%	3,109
10	5.3%	1,910
11	1.0%	564
12	9.1%	10,098
13	2.7%	2,282
14	1.9%	836
Segment	Weight	AADT
15	0.5%	273
16	2.5%	486
17	6.7%	3,818
18	8.8%	4,031
19	3.9%	1,818
20	4.2%	958
21	1.1%	234
22	0.5%	67
Sum	100.0%	36,620

# THE IH-35 CORRIDOR: CALENDAR YEAR 2000 DATA

Table 4a Interstate 35, Calendar Year 2000 Data

Interstate 35						
Within 100	Within 100 km of the US-Mexico Border?					
Serves an Ir	nternational POE?			Υ		
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic		
1	20.060	20.660	0.600	16,000		
2	0.880	2.669	1.789	46,370		
3	2.669	4.090	1.421	56,910		
4	4.090	5.025	0.935	59,020		
5	5.025	5.472	0.447	37,430		
6	5.472	7.525	2.053	23,170		
7	7.525	11.968	4.443	16,080		
8	0.000	1.904	1.904	16,080		
9	1.904	7.185	5.281	13,580		
10	7.185	8.274	1.089	12,990		
11	8.278	15.523	7.245	12,990		
12	15.523	16.980	1.457	12,180		
13	16.980	26.869	9.889	12,180		
14	20.343	21.442	1.099	11,960		
15	21.442	25.908	4.466	10,900		
16	25.908	38.086	12.178	11,000		
17	20.087	20.862	0.775	9,680		
18	14.340	20.087	5.747	10,840		
19	10.154	14.307	4.153	11,080		
		Sum	66.971	400,440		

Estim	ating the Weighted Averages Interstate 35	
Segment	Weight	AADT
1	0.9%	143
2	2.7%	1,239
3	2.1%	1,208
4	1.4%	824
5	0.7%	250
6	3.1%	710
7	6.6%	1,067
8	2.8%	457
9	7.9%	1,071
10	1.6%	211
11	10.8%	1,405
12	2.2%	265
Segment	Weight	AADT
13	14.8%	1,799
14	1.6%	196
15	6.7%	727
16	18.2%	2,000
17	1.2%	112
18	8.6%	930
19	6.2%	687
Sum	100.0%	15,301

Table 4b United States 90, Calendar Year 2000 Data

Within 100 km	of the US-Mexico	United States 9		Υ
		Boi dei :		Y
Segment #	rnational POE?  Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily
oegment "	begin i ost wine	End i ost ivilie	Length Miles	Traffic
1	1.714	2.521	0.807	17,500
2	2.521	4.155	1.634	17,100
3	4.155	5.118	0.963	14,700
4	5.118	6.948	1.830	9,200
5	6.948	12.876	5.928	4,500
6	0.000	6.312	6.312	3,400
7	6.312	14.781	8.469	3,200
8	14.781	16.834	2.053	3,200
9	16.834	17.601	0.767	3,800
10	17.601	17.938	0.337	3,100
11	17.938	18.478	0.540	3,800
12	18.478	18.711	0.233	5,000
13	18.711	19.333	0.622	3,600
14	19.333	32.107	12.774	3,000
15	32.107	32.520	0.413	2,900
16	32.520	38.000	5.480	3,100
17	69.304	69.655	0.351	5,400
18	69.655	71.838	2.183	7,700
19	71.838	72.615	0.777	29,000
20	72.615	73.193	0.578	30,000
21	73.193	73.738	0.545	26,000
22	73.738	74.081	0.343	22,000
23	50.875	51.347	0.472	1,900
24	51.347	62.249	10.902	2,100
25	62.249	67.029	4.780	2,500
26	67.029	69.304	2.275	5,400
27	42.830	50.870	8.040	1,900
28	0.000	1.364	1.364	1,700
29	1.364	9.329	7.965	1,750
30	9.329	10.533	1.204	1,850
31	10.533	10.973	0.440	1,900
32	12.896	21.631	8.735	1,700
33	0.000	3.174	3.174	1,650
34	3.174	11.896	8.722	1,700
35	0.000	11.291	11.291	1,650
36	42.773	52.258	9.485	1,650
37	32.750	40.216	7.466	1,650
38	40.216	42.754	2.538	1,650
39	25.351	32.750	7.399	1,600
40	13.050	14.859	1.809	1,650

41	14.859	18.160	3.30	)1	1,600
Segment #	Begin Post Mile	End Post Mile	Length		Avg Ann Daily Traffic
42	18.160	24.926	6.76	66	1,600
43	1.000	11.257	10.2	57	550
44	11.257	12.118	0.86	51	760
45	12.118	12.537	0.41	19	2,600
46	12.537	12.820	0.28	33	2,600
47	12.820	13.002	0.18	32	2,600
48	13.002	14.005	1.00	)3	2,600
		Sum	175.0		272,010
	Estima	ting the Weighte			
<u> </u>		United States 9	<del>7</del> 0		AADT
Segme	ent	Weight			AADT
1		0.5%			81
3		0.9%			160 81
4		0.6% 1.0%			96
5		3.4%			96 152
6		3.6%			123
7		4.8%			155
8		1.2%			38
9		0.4%		17	
10		0.2%			6
11		0.3%			12
12		0.1%			7
13		0.4%			13
14		7.3%			219
15		0.2%			7
16		3.1%			97
17		0.2%			11
18		1.2%			96
19		0.4%			129
20		0.3%			99
21		0.3%			81
22		0.2%			43
23		0.3%			5
24		6.2%			131
25		2.7%		68	
26 27		1.3%		70 87	
28		4.6% 0.8%			13
29		4.5%			80
30		0.7%			13
31		0.3%			5
32		5.0%			85
33		1.8%			30
34		5.0%			85
35		6.4%			106

36	5.4%	89		
Segment	Weight	AADT		
37	4.3%	70		
38	1.4%	24		
39	4.2%	68		
40	1.0%	17		
41	1.9%	30		
42	3.9%	62		
43	5.9%	32		
44	0.5%	4		
45	0.2%	6		
46	0.2%	4		
47	0.1%	3		
48	0.6%	15		
Sum	100.0%	1,725		
Source: Texas BINS Technical Committee representative				

Table 4c State Spur 20, Calendar Year 2000 Data

		State Spur 20			
Within 100	km of the US-Mexico	Border?		Υ	
Serves an Ir	Υ				
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	
1	0.000	1.594	1.594	19,400	
2	0.000	1.056	1.056	13,900	
3	1.056	4.377	3.321	7,700	
4	4.377	8.729	4.352	15,800	
5	8.729	10.000	1.271	20,000	
6	10.000	10.923	0.923	20,000	
7	10.923	11.397	0.474	15,600	
8	11.397	12.542	1.145	13,800	
		Sum	14.136	126,200	
	Estima	ating the Weighted Ave	rages		
		State Spur 20			
	Segment	Weight		AADT	
	1	11.3%		174	
	2	7.5%		371	
	3	23.5%		163	
	4	30.8%		221	
5		9.0%		133	
6		6.5%		613	
7		3.4%		1,035	
	8	8.1%		392	
	Sum	100.0%		3,103	
Source: Texa	s BINS Technical Committe	e representative			

# THE IH-35 CORRIDOR: CALENDAR YEAR 2020 DATA

Table 5a Interstate 35, Calendar Year 2020 Data

	Interstate 35					
Within 100	Within 100 km of the US-Mexico Border?					
Serves an I	nternational POE?			Υ		
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic		
1	20.060	20.660	0.600	22,400		
2	0.880	2.669	1.789	72,980		
3	2.669	4.090	1.421	107,770		
4	4.090	5.025	0.935	119,070		
5	5.025	5.472	0.447	64,380		
6	5.472	7.525	2.053	51,420		
7	7.525	11.968	4.443	39,900		
8	0.000	1.904	1.904	39,900		
9	1.904	7.185	5.281	27,720		
10	7.185	8.274	1.089	27,470		
11	8.278	15.523	7.245	27,470		
12	15.523	16.980	1.457	26,130		
13	16.980	26.869	9.889	26,130		
14	20.343	21.442	1.099	25,930		
15	21.442	25.908	4.466	21,220		
16	25.908	38.086	12.178	23,030		
17	20.087	20.862	0.775	21,090		
18	14.340	20.087	5.747	22,980		
19	10.154	14.307	4.153	23,280		
		Sum	66.971	790,270		

Estimating the Weighted Averages Interstate 35				
Segment	Weight	AADT		
1	0.9%	201		
2	2.7%	1,950		
3	2.1%	2,287		
4	1.4%	1,662		
5	0.7%	430		
6	3.1%	1,576		
7	6.6%	2,647		
8	2.8%	1,134		
9	7.9%	2,186		
10	1.6%	447		
11	10.8%	2,972		
12	2.2%	568		
Segment	Weight	AADT		
13	14.8%	3,858		
14	1.6%	426		
15	6.7%	1,415		
16	18.2%	4,188		
17	1.2%	244		
18	8.6%	1,972		
19	6.2%	1,444		
Sum	100.0%	31,606		

Table 5b United States 90, Calendar Year 2020 Data

		United States 9	90	
Within 100 km	of the US-Mexico			Υ
Serves an Inte	Υ			
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	1.714	2.521	0.807	25,630
2	2.521	4.155	1.634	28,790
3	4.155	5.118	0.963	26,310
4	5.118	6.948	1.830	12,880
5	6.948	12.876	5.928	7,790
6	0.000	6.312	6.312	5,980
7	6.312	14.781	8.469	5,770
8	14.781	16.834	2.053	5,770
9	16.834	17.601	0.767	7,090
10	17.601	17.938	0.337	5,790
11	17.938	18.478	0.540	6,380
12	18.478	18.711	0.233	7,000
13	18.711	19.333	0.622	5,380
14	19.333	32.107	12.774	4,720
15	32.107	32.520	0.413	4,220
16	32.520	38.000	5.480	4,340
17	69.304	69.655	0.351	8,150
18	69.655	71.838	2.183	48,320
19	71.838	72.615	0.777	46,920
20	72.615	73.193	0.578	45,610
21	73.193	73.738	0.545	32,520
22	73.738	74.081	0.343	3,280
23	50.875	51.347	0.472	3,280
24	51.347	62.249	10.902	3,460
25	62.249	67.029	4.780	3,900
26	67.029	69.304	2.275	8,150
27	42.830	50.870	8.040	3,280
28	0.000	1.364	1.364	2,950
29	1.364	9.329	7.965	3,180
30	9.329	10.533	1.204	3,290
31	10.533	10.973	0.440	3,280
32	12.896	21.631	8.735	2,950
33	0.000	3.174	3.174	2,990
34	3.174	11.896	8.722	2,950
35	0.000	11.291	11.291	2,990
36	42.773	52.258	9.485	2,900
37	32.750	40.216	7.466	2,310
38	40.216	42.754	2.538	2,310

Segment #	Begin Post Mile	End Post Mile	Length	Miles	Avg Ann Daily Traffic
39	25.351	32.750	7.39	9	1,600
40	13.050	14.859	1.80	19	1,650
41	14.859	18.160	3.30	1	1,600
42	18.160	24.926	6.76	6	1,600
43	1.000	11.257	10.2	57	550
44	11.257	12.118	0.86	1	760
45	12.118	12.537	0.41	9	2,600
46	12.537	12.820	0.28	3	2,600
47	12.820	13.002	0.18		2,600
48	13.002	14.005	1.00		2,600
		Sum	175.0	72	420,970
	Estimat	ing the Weighte			
	Г	United States 9	90		
Segme	nt	Weight			AADT
1		0.5%			118
2		0.9%			269
3		0.6%			145
4		1.0%			135
5		3.4%			264
6		3.6%			216
7		4.8%			279
8		1.2%			68
9		0.4%			31
10		0.2%			11
11		0.3%			9
12		0.1% 0.4%			9 19
14		7.3%			344
15		0.2%			10
16		3.1%			136
17		0.2%			16
18		1.2%			603
19		0.4%			208
20		0.3%			151
21		0.3%			101
22		0.2%			6
23		0.3%			9
24		6.2%			215
25		2.7%			106
26		1.3%			106
27		4.6%			151
28		0.8%			23
29		4.5%			145
30		0.7%			23
31		0.3%			8

Segment	Weight	AADT
32	5.0%	147
33	1.8%	54
34	5.0%	147
35	6.4%	193
36	5.4%	157
37	4.3%	99
38	1.4%	33
39	4.2%	68
40	1.0%	17
41	1.9%	30
42	3.9%	62
43	5.9%	32
44	0.5%	4
45	0.2%	6
46	0.2%	4
47	0.1%	3
48	0.6%	15
Sum	100.0%	3,167
Source: Texas BINS Technical Com	mittee representative	

Table 5c State Spur 20, Calendar Year 2020 Data

		State Spur 20			
Within 100	km of the US-Mexico	Border?		Υ	
Serves an I	Serves an International POE?				
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	
1	0.000	1.594	1.594	34,920	
2	0.000	1.056	1.056	21,680	
3	1.056	4.377	3.321	12,010	
4	4.377	8.729	4.352	24,650	
5	8.729	10.000	1.271	31,200	
6	10.000	10.923	0.923	31,200	
7	10.923	11.397	0.474	24,340	
8	11.397	12.542	1.145	21,530	
		Sum	14.136	201,530	
	Estim	nating the Weighted Ave	erages		
		State Spur 20			
	Segment	Weight		AADT	
	1	11.3%		313	
	2	7.5%		579	
	3	23.5%		255	
	4	30.8%		344	
	5 9.0% 208		208		
6		6.5%		956	
7		3.4%		1,615	
	8	8.1%		612	
	Sum	100.0%		4,883	
Source: Texa	as BINS Technical Committe	ee representative			

# THE IH-69 CORRIDOR: CALENDAR YEAR 2000 DATA

Table 6a International Highway 59, Calendar Year 2000 Data

Within 100	km of the US-Mexico	Border?		Υ	
	Serves an International POE?			Υ	
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	
1	46.140	47.558	1.418	28,000	
2	44.740	46.140	1.400	23,000	
3	41.351	44.740	3.389	5,400	
4	28.069	41.351	13.282	3,400	
5	23.364	28.069	4.705	2,700	
6	15.767	23.364	7.597	2,700	
7	11.627	15.767	4.140	3,500	
8	2.920	11.627	8.707	2,900	
9	0.003	2.920	2.917	3,100	
10	0.000	0.453	0.453	5,100	
11	0.453	2.984	2.531	3,900	
12	2.984	13.380	10.396	3,100	
13	0.000	8.074	8.074	2,300	
		Sum	69.009	89,100	
	Estim	ating the Weighted Ave	erages		
	I	nternational Highway 5	9		
	Segment	Weight		AADT	
	1	2.1%		575	
	2	2.0%		467	
	3	4.9%		265	
	4	19.2%		654	
	5	6.8%		184	
	6	11.0%		297	
	7	6.0%		210	
	8	12.6%		366	
	9	4.2%		131	
	10	0.7%		33	
	11	3.7%		143	
	12	15.1%		467	
	13	11.7%		269	
	Sum	100.0%		4,062	

Table 6b United States 77, Calendar Year 2000 Data

Nithin 100 km	of the US-Mexico	Border?		Υ
Serves an Inte	rnational POE?			Υ
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	5.325	6.161	0.836	15,840
2	6.161	8.124	1.963	15,730
3	8.124	9.620	1.496	17,650
4	9.620	10.754	1.134	15,470
5	10.754	11.867	1.113	25,860
6	11.867	12.322	0.455	25,860
7	12.322	13.165	0.843	54,270
8	13.165	13.964	0.799	53,860
9	13.964	15.402	1.438	60,460
10	15.402	17.558	2.156	43,570
11	17.558	19.060	1.502	49,380
12	19.060	19.560	0.500	40,220
13	19.560	21.543	1.983	41,010
14	21.543	23.908	2.365	41,050
15	23.908	26.848	2.940	33,160
16	26.848	28.520	1.672	34,440
17	28.520	31.651	3.131	34,840
18	31.629	32.227	0.598	34,840
19	32.227	33.879	1.652	44,420
20	0.000	0.060	0.060	19,300
21	33.879	34.409	0.530	44,420
22	34.409	35.474	1.065	29,620
23	35.474	36.551	1.077	35,230
24	36.551	37.128	0.577	41,480
25	37.128	37.876	0.748	27,440
26	0.000	0.921	0.921	14,790
27	0.921	4.325	3.404	15,840
28	5.021	5.925	0.904	19,300
29	9.999	14.965	4.966	9,900
30	14.965	16.539	1.574	9,700
31	16.539	18.045	1.506	10,000
32	18.045	20.209	2.164	9,070
33	20.209	23.252	3.043	15,700
34	23.252	26.844	3.592	15,600
35	26.844	28.275	1.431	15,780
36	0.011	9.722	9.711	9,400
37	9.722	12.988	3.266	9,400
	1	Sum	69.115	1,033,900

	United States 77	
Segment	Weight	AADT
1	1.2%	192
2	2.8%	447
3	2.2%	382
4	1.6%	254
5	1.6%	416
6	0.7%	170
7	1.2%	662
8	1.2%	623
9	2.1%	1,258
10	3.1%	1,359
11	2.2%	1,073
12	0.7%	291
13	2.9%	1,177
14	3.4%	1,405
15	4.3%	1,411
16	2.4%	833
17	4.5%	1,578
18	0.9%	301
19	2.4%	1,062
20	0.1%	17
21	0.8%	341
22	1.5%	456
23	1.6%	549
24	0.8%	346
25	1.1%	297
26	1.3%	197
27	4.9%	780
28	1.3%	252
29	7.2%	711
30	2.3%	221
31	2.2%	218
32	3.1%	284
33	4.4%	691
34	5.2%	811
35	2.1%	327
36	14.1%	1,321
37	4.7%	444
Sum	100.0%	23,157

Table 6c United States 281, Calendar Year 2000 Data

Nithin 100 km	of the US-Mexico I	Border?		Υ
Serves an Inte	Υ			
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	5.000	5.738	0.738	35,000
2	3.385	3.966	0.581	15,000
3	3.966	4.432	0.466	8,600
4	1.497	3.385	1.888	18,300
5	0.213	1.497	1.284	13,000
6	46.341	48.342	2.001	10,100
7	45.843	46.341	0.498	18,500
8	43.843	45.843	2.000	16,600
9	42.845	43.843	0.998	19,600
10	41.355	42.845	1.490	21,000
11	6.585	7.584	0.999	84,000
12	4.945	6.585	1.640	67,000
13	3.946	4.945	0.999	43,000
14	2.788	3.946	1.158	45,000
15	1.000	2.780	1.780	38,000
16	33.366	33.849	0.483	28,000
17	32.326	33.366	1.040	27,000
18	31.329	32.326	0.997	28,000
19	30.620	31.329	0.709	20,000
20	29.216	30.620	1.404	28,000
21	27.839	29.216	1.377	24,000
22	23.261	25.654	2.393	18,000
23	15.837	23.261	7.424	15,000
24	15.561	15.837	0.276	11,000
25	3.700	14.600	10.900	9,900
26	3.162	10.998	7.836	9,900
27	1.413	3.162	1.749	10,500
28	0.000	1.413	1.413	10,600
29	31.316	32.721	1.405	10,200
30	26.177	31.316	5.139	10,900
31	2.985	4.084	1.099	14,600
32	2.512	2.985	0.473	16,100
33	2.497	3.011	0.514	13,500
34	0.500	2.497	1.997	11,400
	1	Sum	67.148	769,300

	United States 281	
Segment	Weight	AADT
1	1.1%	385
2	0.9%	130
3	0.7%	60
Segment	Weight	AADT
4	2.8%	515
5	1.9%	249
6	3.0%	301
7	0.7%	137
8	3.0%	494
9	1.5%	291
10	2.2%	466
11	1.5%	1,250
12	2.4%	1,636
13	1.5%	640
14	1.7%	776
15	2.7%	1,007
16	0.7%	201
17	1.5%	418
18	1.5%	416
19	1.1%	211
20	2.1%	585
21	2.1%	492
22	3.6%	641
23	11.1%	1,658
24	0.4%	45
25	16.2%	1,607
26	11.7%	1,155
27	2.6%	273
28	2.1%	223
29	2.1%	213
30	7.7%	834
31	1.6%	239
32	0.7%	113
33	0.8%	103
34	3.0%	339
Sum	100.0%	18,107

Table 6d State 359, Calendar Year 2000 Data

		State 359				
Within 100 km	of the US-Mexico	Border?		Υ		
Serves an Inte	Serves an International POE?					
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic		
1	2.219	2.741	0.522	12,300		
2	2.741	3.938	1.197	8,300		
3	3.938	5.230	1.292	13,200		
4	5.230	6.925	1.695	11,500		
5	6.925	12.699	5.774	7,700		
6	12.699	16.105	3.406	7,700		
7	16.105	21.436	5.331	5,200		
8	21.436	25.304	3.868	2,700		
9	25.304	26.819	1.515	2,700		
10	26.819	32.149	5.330	2,600		
11	32.149	33.512	1.363	2,000		
12	33.512	33.598	0.086	2,000		
13	33.598	33.820	0.222	2,100		
14	33.820	42.563	8.743	2,200		
15	42.563	42.740	0.177	2,100		
16	42.740	46.041	3.301	2,100		
17	0.000	3.974	3.974	2,100		
18	0.000	3.588	3.588	2,100		
19	3.588	4.587	0.999	2,300		
20	4.587	5.134	0.547	5,500		
21	5.134	5.481	0.347	6,000		
22	5.892	6.105	0.213	3,700		
23	6.105	6.318	0.213	2,400		
24	6.318	6.736	0.418	2,200		
25	6.736	10.183	3.447	1,750		
	•	Sum	57.568	114,450		

	State 359	
Segment	Weight	AADT
1	0.9%	112
2	2.1%	173
3	2.2%	296
4	2.9%	339
5	10.0%	772
6	5.9%	456
7	9.3%	482
8	6.7%	181
9	2.6%	71
10	9.3%	241
11	2.4%	47
12	0.1%	3
Segment	Weight	AADT
13	0.4%	8
14	15.2%	334
15	0.3%	6
16	5.7%	120
17	6.9%	145
18	6.2%	131
19	1.7%	40
20	1.0%	52
21	0.6%	36
22	0.4%	14
23	0.4%	9
24	0.7%	16
25	6.0%	105
Sum	100.0%	4,189

# THE IH-69 CORRIDOR: CALENDAR YEAR 2020 DATA

Table 7a
International Highway 59, Calendar Year 2020 Data

	<u> </u>	nternational Highway 5	9	1	
Within 100	km of the US-Mexico	Border?		Υ	
Serves an li	nternational POE?			Υ	
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	
1	46.140	47.558	1.418	39,200	
2	44.740	46.140	1.400	50,970	
3	41.351	44.740	3.389	8,420	
4	28.069	41.351	13.282	5,300	
5	23.364	28.069	4.705	4,210	
6	15.767	23.364	7.597	4,210	
7	11.627	15.767	4.140	5,460	
8	2.920	11.627	8.707	4,520	
9	0.003	2.920	2.917	4,340	
10	0.000	0.453	0.453	7,140	
11	0.453	2.984	2.531	6,080	
12	2.984	13.380	10.396	4,840	
13	0.000	8.074	8.074	3,700	
		Sum	69.009	148,390	
	Estim	ating the Weighted Ave	erages		
	Ī	nternational Highway 5	9		
	Segment	Weight		AADT	
	1	2.1%		805	
	2	2.0%		1,034	
	3	4.9%		414	
	4	19.2%		1,020	
	5	6.8%		287	
	6	11.0%		463	
	7	6.0%		328	
	8	12.6%		570	
	9	4.2%		183	
	10	0.7%		47	
	11	3.7%		223	
	12	15.1%		729	
	13	11.7%		433	

Table 7b United States 77, Calendar Year 2000 Data

		<b>United States 7</b>	7	
Within 100 km	of the US-Mexico	Border?		Υ
Serves an Inte	Υ			
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	5.325	6.161	0.836	27,990
2	6.161	8.124	1.963	27,360
3	8.124	9.620	1.496	31,250
4	9.620	10.754	1.134	24,130
5	10.754	11.867	1.113	36,200
6	11.867	12.322	0.455	36,200
7	12.322	13.165	0.843	75,980
8	13.165	13.964	0.799	84,020
9	13.964	15.402	1.438	88,160
10	15.402	17.558	2.156	67,970
11	17.558	19.060	1.502	70,360
12	19.060	19.560	0.500	60,770
13	19.560	21.543	1.983	73,020
14	21.543	23.908	2.365	70,420
15	23.908	26.848	2.940	58,200
16	26.848	28.520	1.672	57,290
17	28.520	31.651	3.131	56,660
18	31.629	32.227	0.598	56,660
19	32.227	33.879	1.652	80,080
20	0.000	0.060	0.060	23,240
21	33.879	34.409	0.530	80,080
22	34.409	35.474	1.065	46,210
23	35.474	36.551	1.077	54,960
24	36.551	37.128	0.577	58,070
25	37.128	37.876	0.748	39,170
26	0.000	0.921	0.921	25,330
27	0.921	4.325	3.404	27,990
28	5.021	5.925	0.904	23,240
29	9.999	14.965	4.966	18,210
30	14.965	16.539	1.574	19,030
31	16.539	18.045	1.506	15,600
32	18.045	20.209	2.164	14,150
33	20.209	23.252	3.043	29,470
34	23.252	26.844	3.592	27,740
35	26.844	28.275	1.431	27,850
36	0.011	9.722	9.711	18,940
37	9.722	12.988	3.266	17,920
	<u> </u>	Sum	69.115	1,649,920

United States 77						
Segment	Weight	AADT				
1	1.2%	339				
2	2.8%	777				
3	2.2%	676				
4	1.6%	396				
5	1.6%	583				
6	0.7%	238				
7	1.2%	927				
8	1.2%	971				
9	2.1%	1,834				
10	3.1%	2,120				
11	2.2%	1,529				
12	0.7%	440				
13	2.9%	2,095				
14	3.4%	2,410				
15	4.3%	2,476				
16	2.4%	1,386				
17	4.5%	2,567				
18	0.9%	490				
19	2.4%	1,914				
20	0.1%	20				
21	0.8%	614				
22	1.5%	712				
23	1.6%	856				
24	0.8%	485				
25	1.1%	424				
26	1.3%	338				
27	4.9%	1,379				
28	1.3%	304				
29	7.2%	1,308				
30	2.3%	433				
31	2.2%	340				
32	3.1%	443				
33	4.4%	1,298				
34	5.2%	1,442				
35	2.1%	577				
36	14.1%	2,661				
37	4.7%	847				
Sum	100.0%	38,648				

Table 7c United States 281, Calendar Year 2020 Data

Nithin 100 km	of the US-Mexico I	Border?		Υ
Serves an Inte	rnational POE?			Υ
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	5.000	5.738	0.738	54,600
2	3.385	3.966	0.581	23,400
3	3.966	4.432	0.466	13,420
4	1.497	3.385	1.888	41,770
5	0.213	1.497	1.284	30,070
6	46.341	48.342	2.001	26,130
7	45.843	46.341	0.498	39,890
8	43.843	45.843	2.000	34,200
9	42.845	43.843	0.998	41,560
10	41.355	42.845	1.490	36,410
11	6.585	7.584	0.999	81,850
12	4.945	6.585	1.640	95,190
13	3.946	4.945	0.999	94,180
14	2.788	3.946	1.158	86,090
15	1.000	2.780	1.780	23,770
16	33.366	33.849	0.483	51,790
17	32.326	33.366	1.040	55,280
18	31.329	32.326	0.997	54,220
19	30.620	31.329	0.709	28,500
20	29.216	30.620	1.404	53,540
21	27.839	29.216	1.377	46,050
22	23.261	25.654	2.393	28,080
23	15.837	23.261	7.424	29,380
24	15.561	15.837	0.276	20,370
25	3.700	14.600	10.900	18,610
26	3.162	10.998	7.836	18,680
27	1.413	3.162	1.749	19,690
28	0.000	1.413	1.413	26,020
29	31.316	32.721	1.405	23,680
30	26.177	31.316	5.139	20,590
31	2.985	4.084	1.099	20,440
32	2.512	2.985	0.473	22,540
33	2.497	3.011	0.514	18,900
34	0.500	2.497	1.997	17,100
	1	Sum	67.148	1,295,990

	United States 281	
Segment	Weight	AADT
1	1.1%	600
2	0.9%	202
3	0.7%	93
Segment	Weight	AADT
4	2.8%	1,174
5	1.9%	575
6	3.0%	779
7	0.7%	296
8	3.0%	1,019
9	1.5%	618
10	2.2%	808
11	1.5%	1,218
12	2.4%	2,325
13	1.5%	1,401
14	1.7%	1,485
15	2.7%	630
16	0.7%	373
17	1.5%	856
18	1.5%	805
19	1.1%	301
20	2.1%	1,119
21	2.1%	944
22	3.6%	1,001
23	11.1%	3,248
24	0.4%	84
25	16.2%	3,021
26	11.7%	2,180
27	2.6%	513
28	2.1%	548
29	2.1%	495
30	7.7%	1,576
31	1.6%	335
32	0.7%	159
33	0.8%	145
34	3.0%	509
Sum	100.0%	31,433

Table 7d State 359, Calendar Year 2020 Data

		State 359		
Within 100 km	of the US-Mexico	Border?		Υ
Serves an Inte		Υ		
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	2.219	2.741	0.522	19,190
2	2.741	3.938	1.197	14,940
3	3.938	5.230	1.292	25,440
4	5.230	6.925	1.695	28,540
5	6.925	12.699	5.774	16,520
6	12.699	16.105	3.406	16,520
7	16.105	21.436	5.331	8,910
8	21.436	25.304	3.868	4,210
9	25.304	26.819	1.515	4,210
10	26.819	32.149	5.330	5,460
11	32.149	33.512	1.363	4,020
12	33.512	33.598	0.086	4,020
13	33.598	33.820	0.222	3,660
14	33.820	42.563	8.743	4,040
15	42.563	42.740	0.177	3,520
16	42.740	46.041	3.301	3,380
17	0.000	3.974	3.974	3,620
18	0.000	3.588	3.588	3,620
19	3.588	4.587	0.999	3,450
20	4.587	5.134	0.547	7,700
21	5.134	5.481	0.347	9,240
22	5.892	6.105	0.213	5,180
23	6.105	6.318	0.213	3,360
24	6.318	6.736	0.418	3,680
25	6.736	10.183	3.447	2,750
		Sum	57.568	209,180

	State 359	
Segment	Weight	AADT
1	0.9%	174
2	2.1%	311
3	2.2%	571
4	2.9%	840
5	10.0%	1,657
6	5.9%	977
7	9.3%	825
8	6.7%	283
9	2.6%	111
10	9.3%	506
11	2.4%	95
12	0.1%	6
Segment	Weight	AADT
13	0.4%	14
14	15.2%	614
15	0.3%	11
16	5.7%	194
17	6.9%	250
18	6.2%	226
19	1.7%	60
20	1.0%	73
21	0.6%	56
22	0.4%	19
23	0.4%	12
24	0.7%	27
25	6.0%	165
Sum	100.0%	8,075

# THE U.S. 83 CORRIDOR: CALENDAR YEAR 2000 DATA

Table 8a United States 83, Calendar Year 2000 Data

				United S	tates 8	3			
Within 1	100 km of tl	he US-Mexic	o Border?		Υ				
	Serves	an Interna	tional POE?		Υ				
Seg- ment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	Seg #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1					39	0.000	48.143	48.143	44,230
2					40	9.771	10.244	0.473	27,000
3					41	10.244	12.831	2.587	26,000
4					42	12.831	14.170	1.339	31,000
5					43	14.170	16.026	1.856	43,380
6					44	16.026	17.744	1.718	43,010
7					45	17.744	18.755	1.011	48,670
8					46	18.755	20.253	1.498	61,110
9					47	20.253	21.802	1.549	66,500
10					48	21.802	22.829	1.027	51,110
11					49	22.829	23.780	0.951	50,490
12					50	23.780	25.249	1.469	70,830
13					51	25.249	25.790	0.541	72,250
14					52	25.790	27.455	1.665	68,420
15					53	27.455	28.488	1.033	89,590
16					54	28.488	29.899	1.411	76,940
17					55	20.798	21.110	0.312	5,100
18					56	21.110	27.575	6.465	5,500
19					57	27.575	30.377	2.802	6700
20					58	30.377	31.080	0.703	13,500
21					59	31.080	32.259	1.179	17,400
22					60	32.259	33.470	1.211	10,900
23					61	33.470	36.793	3.323	4,500
24					62	36.793	37.846	1.053	4,400
25					63	37.846	44.432	6.586	4,400
26					64	44.432	48.719	4.287	4,500
27					65	48.719	53.703	4.984	4,500
28	0.000	0.880	0.880	44,230	66	0.000	3.634	3.634	4,600
29	0.880	3.104	2.224	45,220	67	3.634	9.904	6.270	4,500
30	3.104	4.809	1.705	48,490	68	1.071	2.042	0.971	33,000
31	4.809	6.981	2.172	45,910	69	2.042	6.449	4.407	30,000
32	6.981	8.730	1.749	46,250	70	6.449	8.248	1.799	11,200
33	8.730	9.838	1.108	46,250	71	8.248	11.118	2.870	11,300
34	29.899	31.408	1.509	86,470	72	11.118	17.048	5.930	4,600
35	31.408	33.661	2.253	76,750	73	16.479	29.253	12.774	1,950
36	33.661	36.479	2.818	62,610	74	29.253	32.888	3.635	2,700
37	36.479	41.902	5.423	61,540	75	0.000	13.037	13.037	1,900
٠,	55.177	111702	0.120	3.70.10	, 0	0.000	10.007	10.007	.,,,,,

41.902	47.143	5.241	46,750	76	13.037	16.479	3.442	1,950
						Sum	187.027	1,670,10
		Estim	nating the We	eighted	l Averages			
			United S	tates 8	3			
Segment	Weight		AADT	Se	egment	Weigh	t	AADT
1					39	25.7%	)	11,385
2					40	0.3%		68
3					41	1.4%		360
4					42	0.7%		222
5					43	1.0%		430
6					44	0.9%		395
7					45	0.5%		263
8					46	0.8%		489
9					47	0.8%		551
10					48	0.5%		281
11					49	0.5%		257
12					50	0.8%		556
13					51	0.3%		209
14					52	0.9%		609
15					53	0.6%		495
16					54	0.8%		580
17					55	0.2%		9
18					56	3.5%		190
19					57	1.5%		100
20					58	0.4%		51
21					59	0.6%		110
22					60	0.6%		71
23					61	1.8%		80
24					62	0.6%		25
25					63	3.5%		155
26					64	2.3%		103
27					65	2.7%		120
28	0.5%		208		66	1.9%		89
29	1.2%		538		67	3.4%		151
30	0.9%		442		68	0.5%		171
31	1.2%		533		69	2.4%		707
32	0.9%		433		70	1.0%		108
33	0.6%		274		71	1.5%		173
34	0.8%		698		72	3.2%		146
35	1.2%		925		73	6.8%		133
36	1.5%		943		74	1.9%		52
37	2.9%		1,784		75	7.0%		132
38	2.8%		1,310		76 <b>Sum</b>	1.8% <b>100.0</b> %		36 <b>20,063</b>

Table 8b State Spur-200 / Business-83, Calendar Year 2000 Data

	S	tate Spur-200 / Business-	83							
Within 100	Within 100 km of the US-Mexico Border?									
Serves an li	Serves an International POE?									
Segment #										
1	0.000	0.050	0.050	2,400						
2	0.000	0.699	0.699	250						
3	0.699	1.057	1.057 0.358							
		Sum	1.107	3,100						
	Estim	nating the Weighted Ave	erages							
	Si	tate Spur 200 / Business	83							
	Segment	Weight		AADT						
	1	4.5%		108						
	2	63.1%		158						
	3 32.3%									
	Sum 100.0%									
Source: Texa	as BINS Technical Committe	ee representative								

## THE U.S. 83 CORRIDOR: CALENDAR YEAR 2020 DATA

Table 9a
United States 83, Calendar Year 2020 Data

				United St	tates 8	3			
Within 1	00 km of tl	he US-Mexic	o Border?		Υ				
	Serves	an Interna	tional POE?		Υ				
Seg- ment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	Seg #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1					39	0.000	48.143	48.143	81,380
2					40	9.771	10.244	0.473	47,090
3					41	10.244	12.831	2.587	48,000
4					42	12.831	14.170	1.339	43,400
5					43	14.170	16.026	1.856	87,950
6					44	16.026	17.744	1.718	76,020
7					45	17.744	18.755	1.011	75,930
8					46	18.755	20.253	1.498	95,330
9					47	20.253	21.802	1.549	108,470
10					48	21.802	22.829	1.027	71,550
11					49	22.829	23.780	0.951	78,760
12					50	23.780	25.249	1.469	110,490
13					51	25.249	25.790	0.541	104,260
14					52	25.790	27.455	1.665	95,790
15					53	27.455	28.488	1.033	136,480
16					54	28.488	29.899	1.411	130,540
17					55	20.798	21.110	0.312	10,160
18					56	21.110	27.575	6.465	10,850
19					57	27.575	30.377	2.802	13730
20					58	30.377	31.080	0.703	25,540
21					59	31.080	32.259	1.179	30,990
22					60	32.259	33.470	1.211	23,100
23					61	33.470	36.793	3.323	8,870
24					62	36.793	37.846	1.053	9,970
25					63	37.846	44.432	6.586	9,970
26					64	44.432	48.719	4.287	9,690
27					65	48.719	53.703	4.984	9,590
28	0.000	0.880	0.880	81,250	66	0.000	3.634	3.634	7,180
29	0.880	3.104	2.224	80,720	67	3.634	9.904	6.270	8,630
30	3.104	4.809	1.705	85,800	68	1.071	2.042	0.971	58,670
31	4.809	6.981	2.172	76,220	69	2.042	6.449	4.407	76,490
32	6.981	8.730	1.749	75,440	70	6.449	8.248	1.799	22,480
33	8.730	9.838	1.108	64,750	71	8.248	11.118	2.870	27,940
34	29.899	31.408	1.509	155,930	72	11.118	17.048	5.930	7,180
35	31.408	33.661	2.253	141,560	73	16.479	29.253	12.774	4,360
36	33.661	36.479	2.818	113,840	74	29.253	32.888	3.635	5,210

37	36.479	41.902	5.423	107,280	75	0.000	13.037	13.037	1,900
38	41.902	47.143	5.241	85,690	76	13.037	16.479	3.442	1,950
			Ectim	ating the We	iahtor	1 Avoragos	Sum	187.027	2,844,370
			LStilli	_	_	_			
				United S					
Seç	ment	Weight				AADT			
	1					39	25.7%	)	20,948
	2					40	0.3%		119
	3					41	1.4%		664
	4					42	0.7%		311
	5					43	1.0%		873
	6					44	0.9%		698
	7					45	0.5%		410
	8					46	0.8%		764
	9					47	0.8%		898
	10					48	0.5%		393
	11					49	0.5%		400
	12					50	0.8%		868
	13					51	0.3%		302
	14					52	0.9%		853
	15					53	0.6%		754
	16					54	0.8%		985
	17					55	0.2%		17
	18					56	3.5%		375
	19					57	1.5%		206
	20					58	0.4%		96
	21					59	0.6%		195
	22					60	0.6%		150
	23					61	1.8%		158
	24					62	0.6%		56
	25					63	3.5%		351
	26					64	2.3%		222
	27					65	2.7%		256
	28	0.5%		382		66	1.9%		140
	29	1.2%		960		67	3.4%		289
	30	0.9%		782		68	0.5%		305
	31	1.2%		885		69	2.4%		1,802
	32	0.9%		705		70	1.0%		216
	33	0.6%		384		71	1.5%		429
	34	0.8%		1,258		72	3.2%		228
	35	1.2%		1,705		73	6.8%		298
	36	1.5%		1,715		74	1.9%		101
	27	2.00/		2 111		75	7.00/		122

Source: Texas BINS Technical Committee representative

2.9%

2.8%

37

38

3,111

2,401

75

76

Sum

7.0%

1.8%

100.0%

132

36

36,297

Table 9b State Spur-200 / Business-83, Calendar Year 2020 Data

	Si	tate Spur-200 / Business-	83							
Within 100	Within 100 km of the US-Mexico Border?									
Serves an li	Serves an International POE?									
Segment #										
1	0.000	0.050	0.050	3,740						
2	0.000	0.699	0.699	390						
3	0.699	1.057	1.057 0.358							
		Sum	1.107	4,760						
	Estim	nating the Weighted Ave	erages							
	Si	tate Spur 200 / Business	83							
	Segment	Weight		AADT						
	1	4.5%		169						
	2	63.1%		246						
	3 32.3%									
	Sum 100.0%									
Source: Texa	as BINS Technical Committe	ee representative								

# THE LA ENTRADA AL PACIFICO CORRIDOR

Table 10 United States 67, Calendar Year Data 2000 - 2020

		United States						ed States 67	
		Calendar Year	2000				Calen	dar Year 2020	)
Wi	thin 100 km	of the US-Mexico	Border?	Υ				Υ	
	Serves a	n International Po	DE?	Υ		Y			
Seg- ment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ar Daily Traffic		Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	14.371	14.871	0.500	3,500		14.371	14.87	0.500	4,900
2	13.465	14.371	0.906	1,450		13.465	14.37		2,030
3	12.974	13.465	0.491	1,350		12.974	13.46		1,890
4	11.705	12.974	1.269	1,000		11.705	12.97		1,400
5	0.000	11.705	11.705	900		0.000	11.70		1,700
6	16.151	33.265	17.114	890		16.151	33.26		1,700
7	1.126	7.842	6.716	1,100		1.126	7.842	6.716	1,540
8	1.000	1.126	0.126	2,400		1.000	1.126		3,620
9	53.830	54.102	0.272	4,200		53.830	54.102		6,800
10	52.700	53.830	1.130	2,300		52.700	53.830		4,300
11	40.005	52.700	12.695	2,100		40.005	52.700		3,700
12	29.811	37.202	7.391	2,100		29.811	37.202		3,700
13	27.925	28.834	0.909	13,600		27.925	28.834		22,220
14	28.834	29.811	0.977	5,800		28.834	29.81	0.977	10,850
15	19.676	25.178	5.502	2,500		19.676	25.178	3 5.502	4,320
16	25.178	27.238	2.060	9,600		25.178	27.238	3 2.060	14,960
17	27.238	27.507	0.269	11,800		27.238	27.50	7 0.269	16,520
18	0.000	3.091	3.091	1,100		0.000	3.091	3.091	2,140
19	3.091	19.676	16.585	1,100		3.091	19.676	6 16.585	2,060
20	1.000	11.970	10.970	1,100		1.000	11.970	10.970	1,540
		Su	m 100.678	69,890			Su	m 100.678	111,890
		E	Stimating the We	ighted A	vera	iges			
	U	nited States 67				Uı	nited Sta	ites 67	
		Year 2000					Year 2	020	
Segr	ment	Weight	AADT	Seg	mer	nt V	/eight	AAI	DT
	1	0.5%	17		1		0.5%	24	
	2	0.9%	13	_	2	(	0.9%	18	
	3	0.5%	7		3	(	0.5%	9	
	4	1.3%	13		4		1.3%	18	
	5	11.6%	105		5	1	1.6%	198	
	6	17.0%	151		6		7.0%	289	
	7	6.7%	73		7		5.7%	103	3
(	3	0.1%	3		8	(	0.1%	5	

9	0.3%	11	9	0.3%	18
Segment	Weight	AADT	Segment	Weight	AADT
10	1.1%	26	10	1.1%	48
11	12.6%	265	11	12.6%	467
12	7.3%	154	12	7.3%	272
13	0.9%	123	13	0.9%	201
14	1.0%	56	14	1.0%	105
15	5.5%	137	15	5.5%	236
16	2.0%	196	16	2.0%	306
17	0.3%	32	17	0.3%	44
18	3.1%	34	18	3.1%	66
19	16.5%	181	19	16.5%	339
20	10.9%	120	20	10.9%	168
Sum	100.0%	1,717	Sum	100.0%	2,933
Source: Texas BINS Tec	hnical Committee repre	esentative	·	·	<u> </u>

## THE PORTS TO PLAINS CORRIDOR: CALENDAR YEAR 2000 DATA

Table 11a United States 57

		United States 57			
Within 100	km of the US-Mexico	Border?		Υ	
Serves an I	Υ				
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	
1	0.000	11.800	11.800	6,700	
2	11.800	14.695	2.895	2,900	
3	0.500	0.881	0.381	10,400	
4	0.881	1.382	0.501	12,700	
5	1.382	2.019	0.637	13,800	
6	2.019	2.432	0.413	19,400	
7	2.432	3.123	0.691	16,400	
8	7.691	16.075	8.384	2,700	
9	0.000	0.428	0.428	4,100	
10	0.428	0.918	0.490	3,500	
11	0.918	5.516	4.598	2,900	
12	5.516	14.659	9.143	2,700	
13	14.379	14.661	0.282	3,600	
14	14.661	15.330	0.669	3,100	
15	15.330	27.497	12.167	2,900	
16	0.000	11.069	11.069	2,900	
17	11.069	21.356	10.287	3,100	
18	21.356	24.220	2.864	2,900	
		Sum	77.699	116,700	
	Estim	ating the Weighted Ave	erages		
		United States 57			
	Segment	Weight		AADT	
	1	15.2%		1,018	
	2	3.7%		108	
	3	0.5%		51	
	4	0.6%		82	
	5	0.8%	113		
	6	0.5%		103	
	7	0.9% 146		146	
	8 10.8%			291	
9		0.6%		23	
	10	0.6%		22	
	11	5.9%		172	
	12	11.8%		318	
	13	0.4%		13	
	14	0.9%		27	
	15	15.7%		454	

Segment	Weight	AADT			
16	14.2%	413			
17	13.2%	410			
18	3.7%	107			
Sum	100.0%	3,870			
Source: Texas BINS Technical Committee representative					

Table 11b United States 277

		United States 277			
Within 100	km of the US-Mexico			Υ	
Serves an I	Serves an International POE?				
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	
1	5.000	5.862	0.862	10,000	
2	13.000	13.379	0.379	7,400	
3	13.379	13.777	0.398	6,700	
4	0.500	0.680	0.180	12,200	
5	0.680	1.249	0.569	5,800	
6	1.249	1.561	0.312	6,700	
7	1.561	2.222	0.661	5,500	
8	0.000	0.097	0.097	13,800	
9	0.097	0.185	0.088	16,600	
10	0.000	16.910	16.910	1,000	
11	36.626	39.290	2.664	1,050	
12	42.185	43.600	1.415	1,250	
13	43.600	52.496	8.896	1,550	
14	1.502	1.909	0.407	5,300	
15	1.909	3.001	1.092	3,900	
16	3.001	6.188	3.187	3,700	
17	6.188	12.679	6.491	2,700	
18	1.000	1.228	0.228	1,400	
19	1.228	14.570	13.342	1,050	
		Sum	58.178	107,600	
	Estin	nating the Weighted Ave	erages		
		United States 277			
	Segment	Weight		AADT	
	1	1.5%		148	
	2	0.7%		48	
	3	0.7%		46	
	4	0.3%		38	
	5	1.0%		57	
	6	0.5%		36	
	7	1.1%		62	
	8	0.2%		23	
	9	0.2%		25	
	10	29.1%		291	
	11	4.6%		48	
	12	2.4%		30	
	13	15.3%		237	
	14	0.7%		37	
	15	1.9%		73	
	16	5.5%		203	

17	11.2%	301		
Segment	Weight	AADT		
18	0.4%	5		
19	22.9%	241		
Sum	100.0%	1,950		
Source: Texas BINS Technical Committee representative				

Table 11c United States 83

		United States	83		
Within 100 km	of the US-Mexico I	Border?		Υ	
Serves an Inte	Serves an International POE?				
Segment #	Begin Post Mile	End Post Mile	Length Mile	Avg Ann Daily Traffic	
1	1.000	1.758	0.758	13,500	
2	1.758	2.479	0.721	17,400	
3	2.479	5.735	3.256	17,800	
4	5.735	7.170	1.435	18,300	
5	7.170	7.599	0.429	18,600	
6	7.599	8.502	0.903	25,000	
7	8.502	10.016	1.514	28,000	
8	10.016	10.024	0.008	27,000	
9	29.146	29.376	0.230	21,000	
10	29.376	29.718	0.342	25,000	
11	29.718	30.221	0.503	26,000	
12	30.221	30.384	0.163	28,000	
13	30.384	30.517	0.133	29,000	
14	30.517	31.293	0.776	27,000	
15	31.293	33.187	1.894	28,000	
16	33.187	35.307	2.120	17,200	
17	35.307	38.698	3.391	14,300	
18	38.698	42.326	3.628	13,500	
19	42.326	44.580	2.254	13,400	
20	44.580	46.747	2.167	13,500	
21	0.142	2.583	2.441	4,100	
22	2.583	6.446	3.863	3,600	
23	6.446	15.275	8.829	5,200	
24	15.275	16.115	0.840	10,900	
25	37.846	44.432	6.586	4,400	
26	44.432	48.719	4.287	4,500	
27	48.719	53.703	4.984	4,500	
		Sum	58.455	458,700	
	Estima	ting the Weighte			
	n	United States	83		
Segme	ent	Weight		AADT	
1_		1.3%		175	
2		1.2%		215	
3		5.6%		991	
4		2.5%		449	
5		0.7%		137	

Segment	Weight	AADT
6	1.5%	386
7	2.6%	725
8	0.0%	4
9	0.4%	83
10	0.6%	146
11	0.9%	224
12	0.3%	78
13	0.2%	66
14	1.3%	358
15	3.2%	907
16	3.6%	624
17	5.8%	830
18	6.2%	838
19	3.9%	517
20	3.7%	500
21	4.2%	171
22	6.6%	238
23	15.1%	785
24	1.4%	157
25	11.3%	496
26	7.3%	330
27	8.5%	384
Sum	100.0%	10,813

## THE PORTS TO PLAINS CORRIDOR: CALENDAR YEAR 2020 DATA

Table 12a United States 57

		<b>United States 57</b>		
Within 100	km of the US-Mexico	Border?		Υ
Serves an I	Υ			
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	0.000	11.800	11.800	9,380
2	11.800	14.695	2.895	5,700
3	0.500	0.881	0.381	14,560
4	0.881	1.382	0.501	24,910
5	1.382	2.019	0.637	20,690
6	2.019	2.432	0.413	35,450
7	2.432	3.123	0.691	36,400
8	7.691	16.075	8.384	4,690
9	0.000	0.428	0.428	5,740
10	0.428	0.918	0.490	4,900
11	0.918	5.516	4.598	5,180
12	5.516	14.659	9.143	4,390
13	14.379	14.661	0.282	5,040
14	14.661	15.330	0.669	5,230
15	15.330	27.497	12.167	4,480
16	0.000	11.069	11.069	4,610
17	11.069	21.356	10.287	4,800
18	21.356	24.220	2.864	4,590
	-	Sum	77.699	200,740
	Estim	ating the Weighted Ave	erages	
		United States 57		
	Segment	Weight		AADT
	1	15.2%		1,425
	2	3.7%		212
	3	0.5%		71
	4	0.6%		161
	5	0.8%		170
	6	0.5%		188
	7	0.9%		324
	8	10.8%		506
	9	0.6%		32
	10	0.6%		31
	11 5.9%			307
	12	11.8%		517
	13	0.4%		18
	14	0.9%		45
	15	15.7%		702

Segment	Weight	AADT			
16	14.2%	657			
17	13.2%	635			
18	3.7%	169			
Sum	100.0%	6,169			
Source: Texas BINS Technical Committee representative					

Table 12b United States 277

		United States 277			
Within 10	0 km of the US-Mex			Υ	
Serves an	Υ				
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic	
1	5.000	5.862	0.862	14,000	
2	13.000	13.379	0.379	10,360	
3	13.379	13.777	0.398	9,380	
4	0.500	0.680	0.180	17,080	
5	0.680	1.249	0.569	8,120	
6	1.249	1.561	0.312	9,380	
7	1.561	2.222	0.661	7,700	
8	0.000	0.097	0.097	21,660	
9	0.097	0.185	0.088	25,740	
10	0.000	16.910	16.910	1,400	
11	36.626	39.290	2.664	1,470	
12	42.185	43.600	1.415	1,750	
13	43.600	52.496	8.896	2,540	
14	1.502	1.909	0.407	7,420	
15	1.909	3.001	1.092	8,030	
16	3.001	6.188	3.187	8,360	
17	6.188	12.679	6.491	5,720	
18	1.000	1.228	0.228	1,960	
19	1.228	14.570	13.342	1,470	
		Sum	58.178	163,540	
	Estima	iting the Weighted Av	/erages		
		<b>United States 277</b>			
	Segment	Weight		AADT	
	1	1.5%		207	
	2	0.7%		67	
	3	0.7%		64	
			53		
5		1.0%		79	
6		0.5%		50	
7		1.1%		87	
8		0.2%		36	
	9	0.2%		39	
	10	29.1%		407	
	11	4.6%		67	

Segment	Weight	AADT				
12	2.4%	43				
13	15.3%	388				
14	0.7%	52				
15	1.9%	151				
16	5.5%	458				
17	11.2%	638				
18	0.4%	8				
19	22.9%	337				
Sum	100.0%	3,233				
Source: Texas BINS Technical Committee	Source: Texas BINS Technical Committee representative					

Table 12c United States 83

		<b>United States</b>	83	
Within 100 km	Υ			
Serves an Inte	rnational POE?			Υ
Segment #	Begin Post Mile	End Post Mile	Length Miles	Avg Ann Daily Traffic
1	1.000	1.758	0.758	26,410
2	1.758	2.479	0.721	30,380
3	2.479	5.735	3.256	29,170
4	5.735	7.170	1.435	29,380
5	7.170	7.599	0.429	34,990
6	7.599	8.502	0.903	45,230
7	8.502	10.016	1.514	56,020
8	10.016	10.024	0.008	47,090
9	29.146	29.376	0.230	33,770
10	29.376	29.718	0.342	39,000
11	29.718	30.221	0.503	40,560
12	30.221	30.384	0.163	46,940
13	30.384	30.517	0.133	49,830
14	30.517	31.293	0.776	53,600
15	31.293	33.187	1.894	62,790
16	33.187	35.307	2.120	37,720
17	35.307	38.698	3.391	29,390
18	38.698	42.326	3.628	27,540
19	42.326	44.580	2.254	27,780
20	44.580	46.747	2.167	27,060
21	0.142	2.583	2.441	8,460
22	2.583	6.446	3.863	7,360
23	6.446	15.275	8.829	10,220
24	15.275	16.115	0.840	22,600
25	37.846	44.432	6.586	9,970
26	44.432	48.719	4.287	9,690
27	48.719	53.703	4.984	9,590
		Sum	58.455	852,540

United States 83		
Segment	Weight	AADT
1	1.3%	342
2	1.2%	375
3	5.6%	1,625
4	2.5%	721
5	0.7%	257
Segment	Weight	AADT
6	1.5%	699
7	2.6%	1,451
8	0.0%	6
9	0.4%	133
10	0.6%	228
11	0.9%	349
12	0.3%	131
13	0.2%	113
14	1.3%	712
15	3.2%	2,034
16	3.6%	1,368
17	5.8%	1,705
18	6.2%	1,709
19	3.9%	1,071
20	3.7%	1,003
21	4.2%	353
22	6.6%	486
23	15.1%	1,544
24	1.4%	325
25	11.3%	1,123
26	7.3%	711
27	8.5%	818
Sum	100.0%	21,393